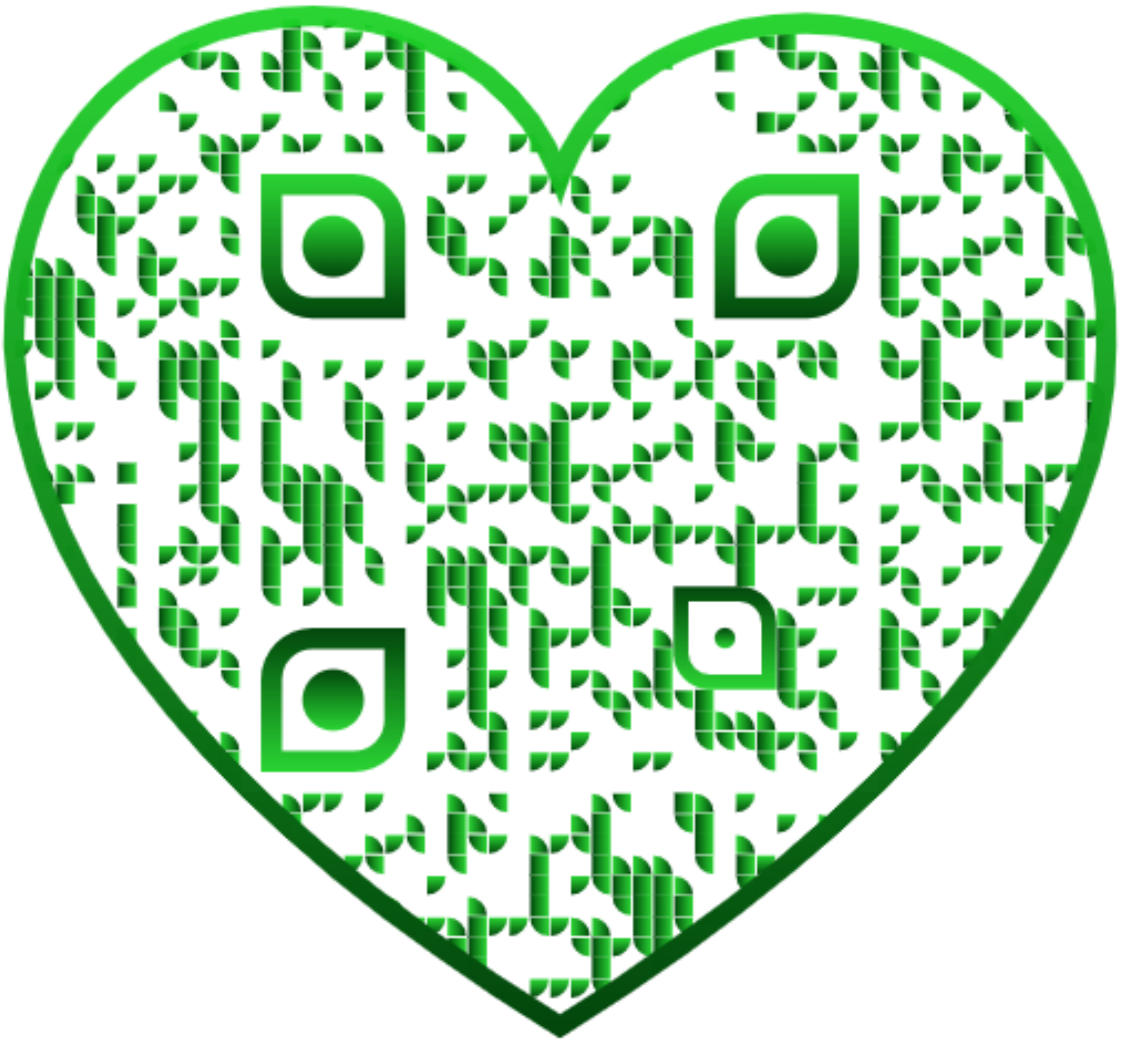
Issue 2/2024 · 5,90 €

lp

ANALOG HIFI AND VINYL CULTURE



finite elemente

THE SCIENCE OF SOUND

MADE IN GERMANY

Pagode Signature MK II

THE ART OF ELEGANCE

MULTIPLE AWARD WINNER

finite elemente
pagode® Signature MKII
Category: Accessory
Sub category: Hi-Fi Rack
Award: PREMIUM

finite elemente
pagode® Signature MKII
Category: Accessory
Sub category: Equipment support
Award: EDITOR'S CHOICE AWARD

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pagode® Signature MKII
Category: Accessory
Sub category: Hi-Fi Rack
Award: hifi+ AWARD

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LP International

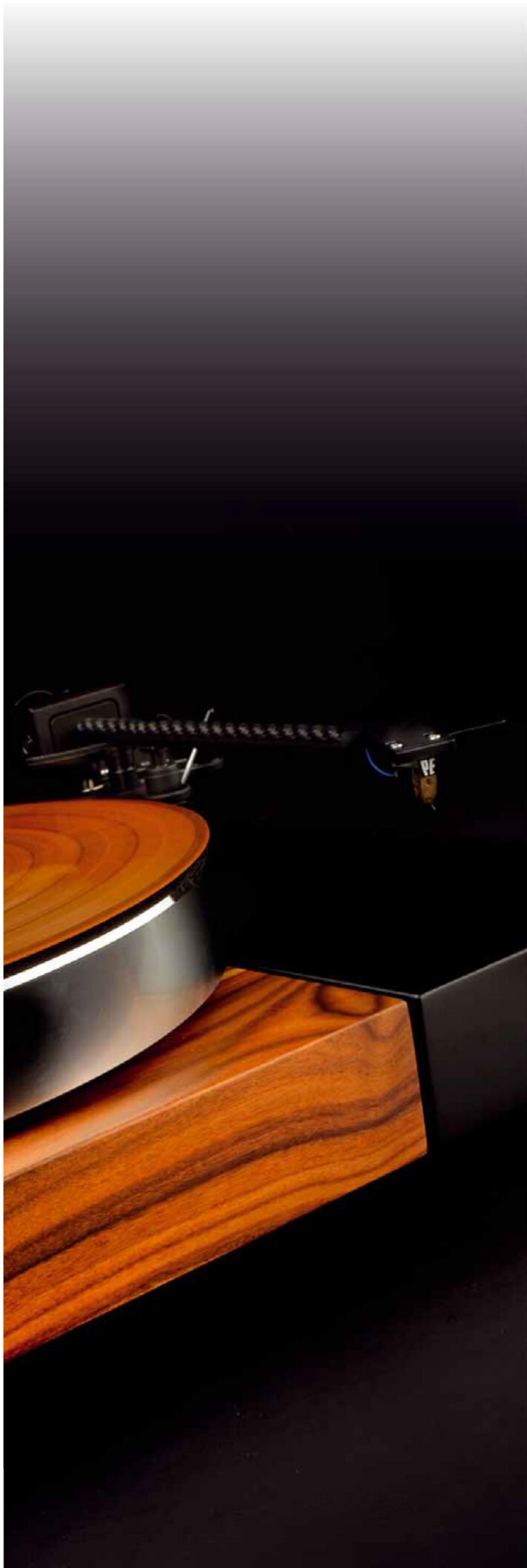
Lost in music

Perhaps it's time to once again talk about why consuming music via vinyl is a good idea. Spotify CEO Daniel Ek recently provided a very important reason for this himself when he claimed that "the cost of producing music is practically zero these days" and that "anyone who wants to can share large amounts of content". This did not make him any friends among music creators, and the resulting shitstorm blew up so strongly that Ek was forced to row back a few days later.

The episode naturally reveals a lot about the relationship between streaming services – especially Spotify – and music creators: It's dairy cattle that have to deliver in as large a quantity as possible. The ridiculous royalties that artists receive for their participation in this perfidious system ultimately force musicians to upload as much material as possible. At a time when artists could still earn their income by participating in the sale of physical recordings, things were different – and better. In any case, the same still applies today: if you want to do something good for your favorite band, you buy records at concerts at the merch, where the proceeds largely end up where they belong.

What will sooner or later break the neck of the three billion Spotify CEO goes far beyond these problems: the countless music generators based on AI are already generating music in a quality that should be completely sufficient for 90 percent of all applications. They won't need records, Spotify or hi-fi systems, and there won't even be any works protected by copyright.

All the more reason to support and honor our music creators in every possible way. The record is one way of doing this.



Holger Barske, Editor in Chief

epos
epos

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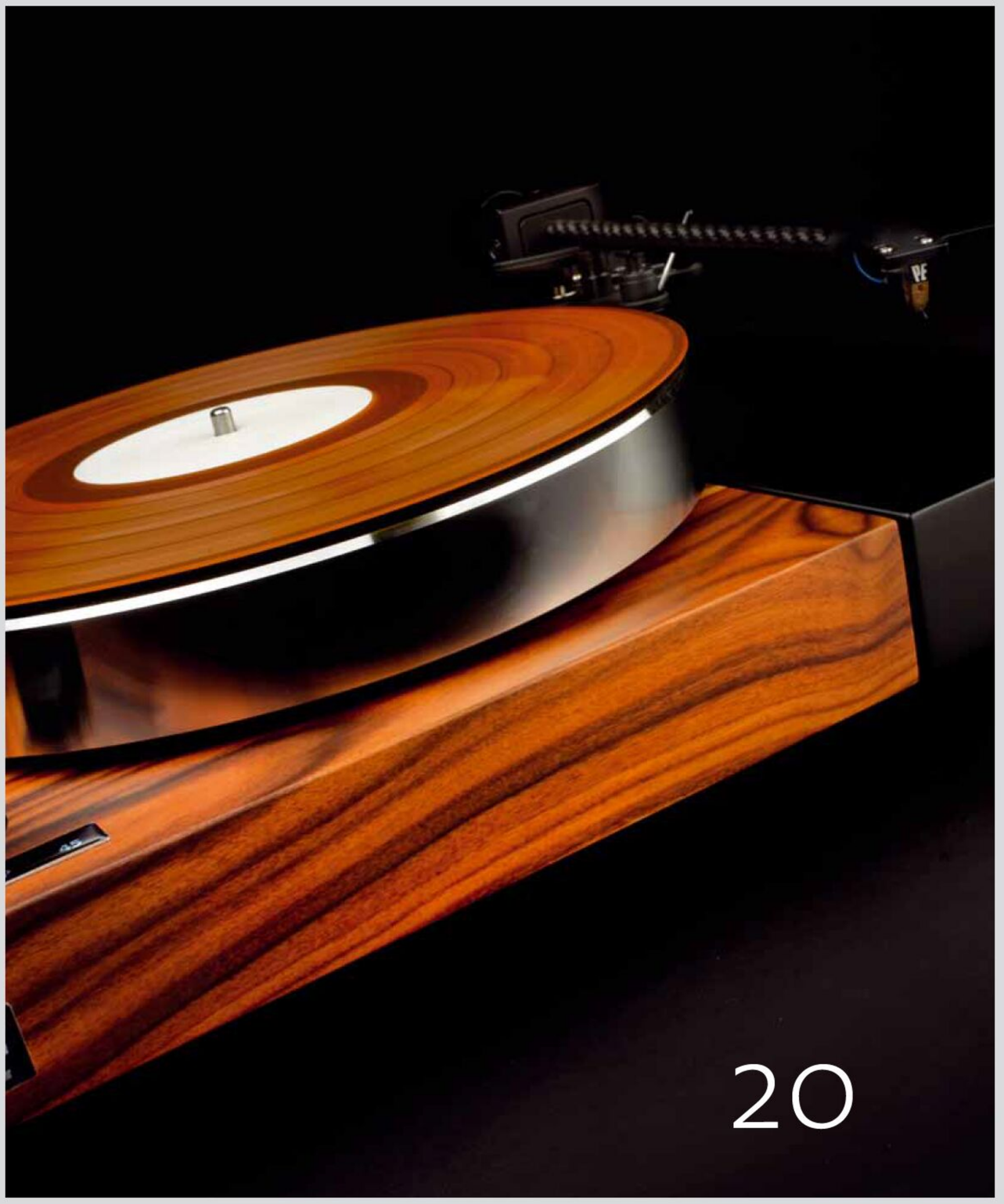

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VIDA
Stereo
Mono.
Direct
Subsonic Filter
High
Low MC Impedance
Equalizer

28

HOLD TIME
Accuphase
LINE
BALANCED
∞ 50 40 30 20 10 5 0 3 dB
0 0.001 0.01 0.1 1 10 31.6 100 200 %
0.0 W
monophonic power amplifier A-300
POWER
Class A

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The almost complete system

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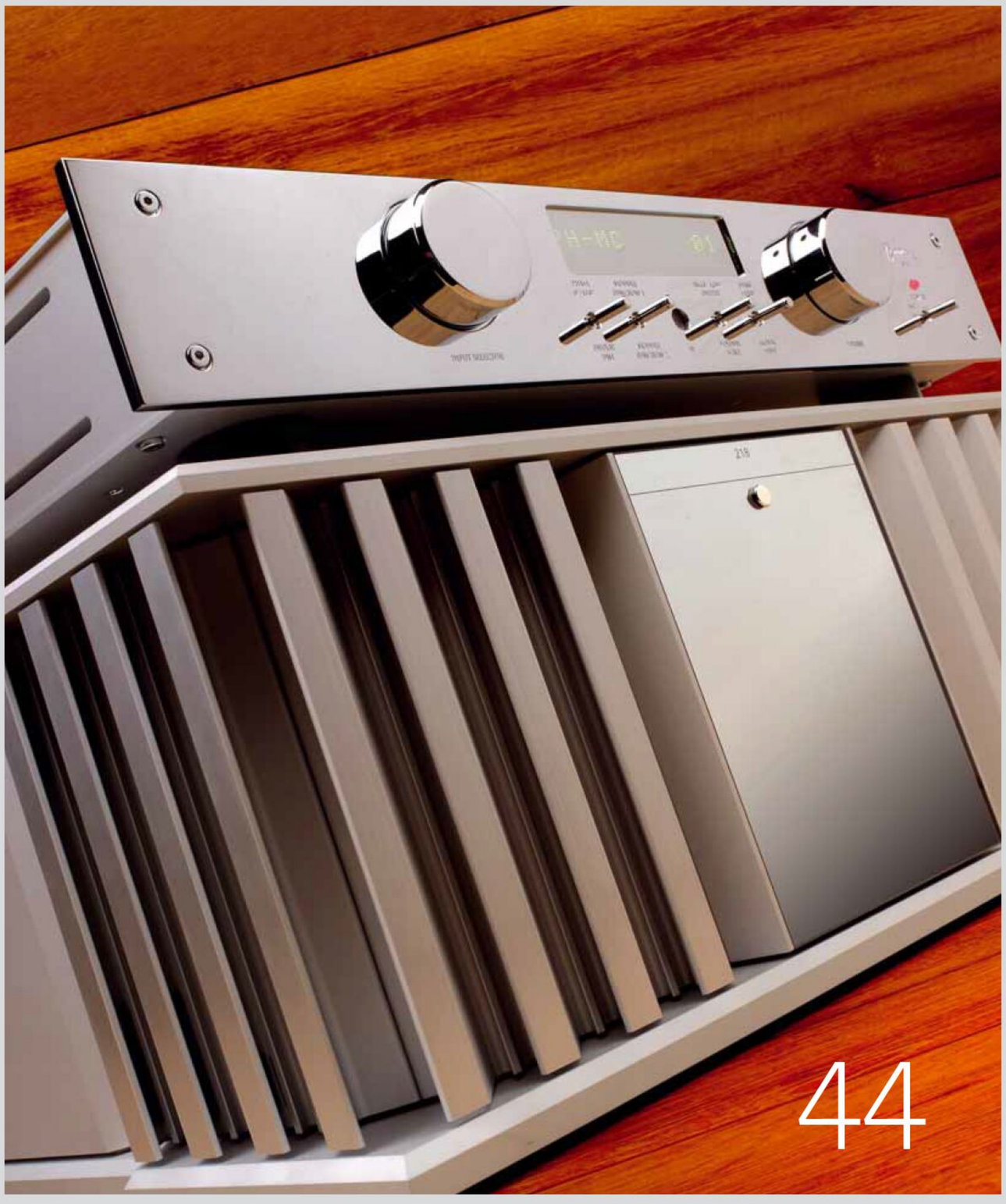


The big show

At some point, the urge for "higher, faster, further" must come to an end, even in terms of HiFi? This year's High End showed that we are still a long way from that.

A million is the new hundred thousand. This impression is hard to avoid when you make your way through the once again excellently attended aisles of the High End and look at the price tags of the sometimes wildly elaborate products from the relevant small manufacturers. And if you don't have anything wild to offer, you simply double the previous year's price of the largely unchanged predecessor model. Whether this is a viable concept in the long term is doubtful, but at the moment the industry only knows one direction: upwards. At least in terms of price and effort. At least it sounded really good from time to time - that's something. The best way to approach this year's High End was to take childishly innocent pleasure in the sheer gigantomania, which – I'm not entirely sure – culminated in the total price of a set-up of 4.5 million.
Nevertheless, we had fun and found a few components suitable for normal Central Europeans amongst all the madness. Of course there are also a few pictures:

Despite – or perhaps because of – the success of the Sasha V, Wilson Audio is launching a new edition of the famous „Watt/Puppy" model

Appropriate: The front panel of these Octave tube monos is the finest goldsmith‘s art

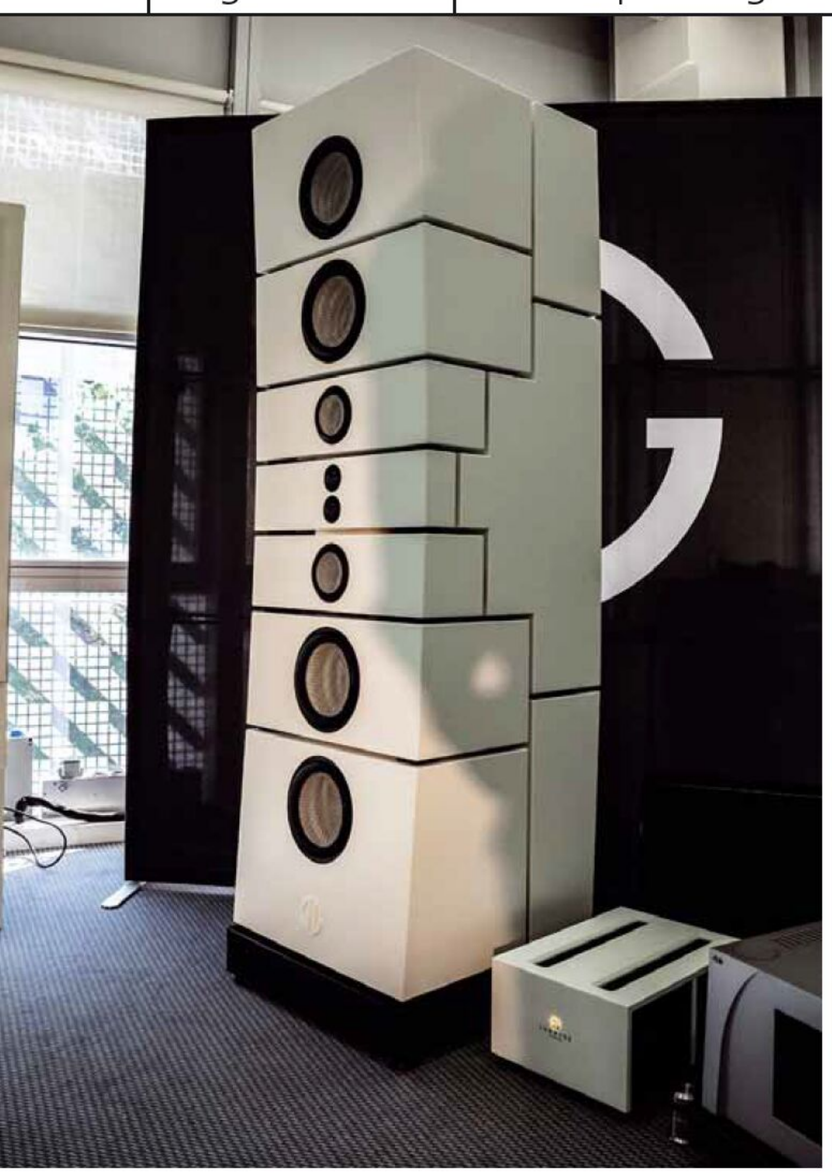
Not quite at the high end, but opposite: Martion‘s fantastic new horn system

Ambitious record player with air bearing and linear tracking tonearm from Japan by CS Port

WBT makes progress in PVD surface coating and can now also coat plastic in all possible colors

A look ahead to next year: this mighty Acapella horn system will be up for auction at the High End next year

LP Int_2-2024



Lyravox showed „Karl der Große“ with rear firing 21" woofer

With Yours Truly: Panel discussion on the the future of high fidelity

The Luphonic R3 impressed in the „Fink team“ room

Also from Fink: the brand new Epos ES-28N

The Aries Cerat turntable is certainly one of the most elaborate constructions of all time

New from Clearaudio: this cute mini record washing machine – of course double-sided

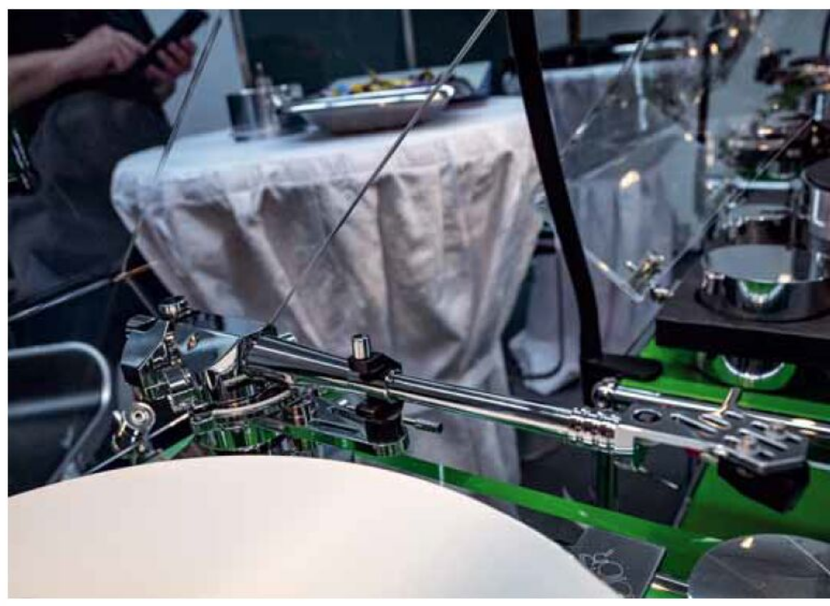
The first smaller Holborne turntable model is ready

Above: Also new at Clearaudio: Record player in guitar shape

Left: Excellent sound: 15" coax at Zeiler Audio

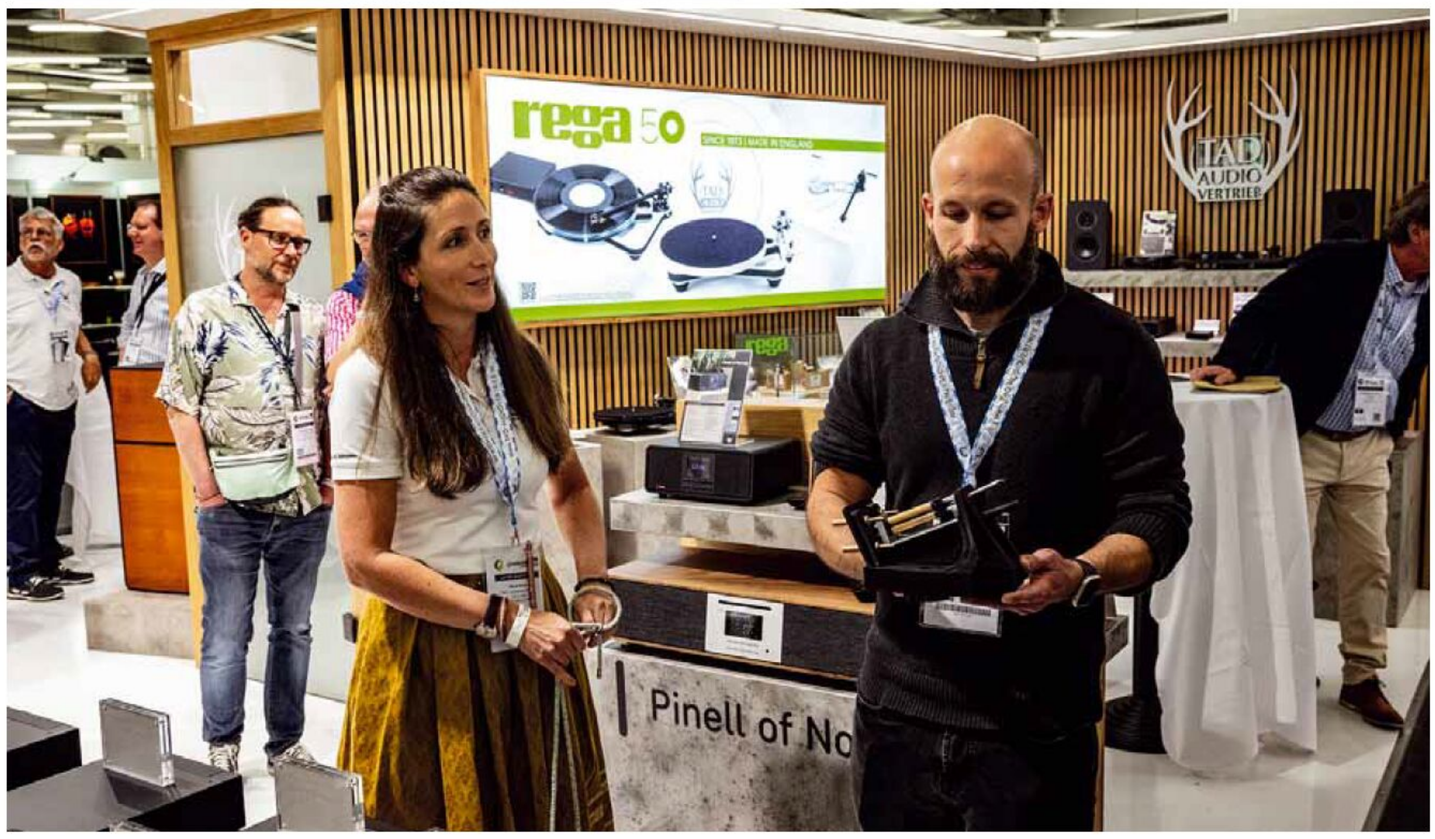
Above: Analog Audio Design TP-1000: The supposedly best playback tape recorder on the market

Above: Line Magnetic played an excellent new loudspeaker with Klangfilm style horn



Above: Transrotor has made some nice upgrades to the in-house tonearms

You have to want Vivid Audio's mighty flagships in your living room



TAD boss Paula Knorrn listens to the Rega presentation of the new generation of cartridges

After a long absence, Acapella is back at the High End – with a bang

Goebel Audio on Pilium amplifiers – a strikingly successful combination

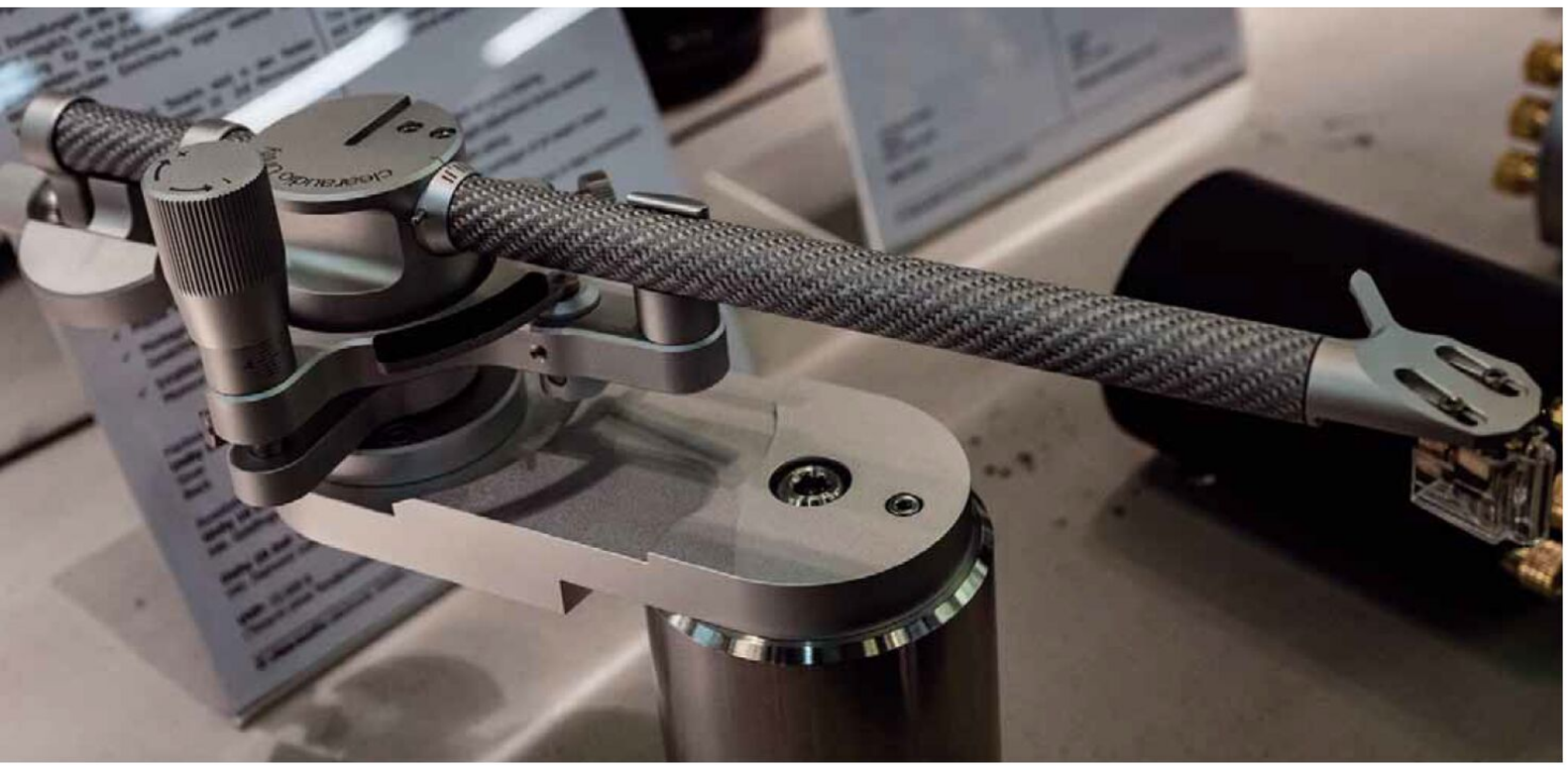
Thomas Mayer's new amplifiers got along perfectly with the Spanish Admire Audio loudspeakers

Powerful in every respect: the new speakers from Cessaro

Pro-Ject boss Heinz Lichtenegger at his daily presentation of new products

Interesting new turntable from Bennyaudio

The brand new Burmester BX100 four-way speaker played absolutely thrillingly



Clearaudio again: the new top-of-the-range „Unity“ tonearm

No longer up to date, but still impressive: Dietrich Brakemeyer‘s Apolyt

When a Korean builds pickups in Berlin: Tedeska cartridges are something special

The 2.5 million installation by Aries Cerat in all its glory

A Sign of Greatness

Of course, I won't try to convince you that I have suddenly become a fan of cute little two-way speakers. But there is a but.

epos

A little history

We remember: Epos was a British loudspeaker manufacturer that established an excellent reputation between 1983 and 1988. Designer and founder Robin Marshall was good at using loudspeaker drivers that were exactly right for the application and working with simple crossovers. The company then passed through various hands, and its star quickly sank. In 2020, the Essen-based loudspeaker professional Karl-Heinz Fink bought the brand, returned to its original virtues, and began to develop „philosophically“ suitable loudspeakers under this label. The first result of his efforts was the Epos ES-14N, which was causing quite a stir in the compact loudspeaker market and was also named „Product Of The Year“ by us for a good reason. It was clear that it would not stop there. These days, Karl-Heinz Fink has let the second Epos arrow from the string: The new one is called the ES-7N and, somewhat surprisingly, is also a two-way compact loudspeaker, but an even smaller one than the ES-14N. This also has pleasing consequences for the pricing: at EUR 2000 per pair, it costs half as much as its „big“ sister.

The ES-7N is a compelling speaker with a net volume of only ten liter

The woofer works with a double magnet system and a 30 mm voice coil

When developing the small Epos, Fink had a role model in mind that no one would have expected: The BR 25 from the pen of Musikelektronik Geithein founder Joachim Kiesler. This was a development from 1984, and despite - or perhaps because of - its „state-owned“ origins, it remains one of the most successful German loudspeakers, with around 650,000 units sold. Fink is a big fan of a whole series of constructive details of this concept and deliberately takes its hat off to Joachim Kiesler with the small Epos model. If you google „RFT BR 25“, you will immediately understand why the ES-7N looks the way it does.

Adjustability

With a net volume of ten liters, the ES-7N should be able to be integrated into pretty much any living environment. It can be placed on a shelf or free-standing in the room on appropriate stands. As both have pretty different acoustic conditions, there is a switch on the back of the speaker that should guarantee optimum results for both placement options. By the way, I find it astonishing that hardly any manufacturer considers this with their compact loudspeakers.

Teammates

Turntable:
· Clearaudio Concept Signature

Phono preamp:
· Clearaudio Balance Reference

Integrated amplifier:
· NEM PRA5

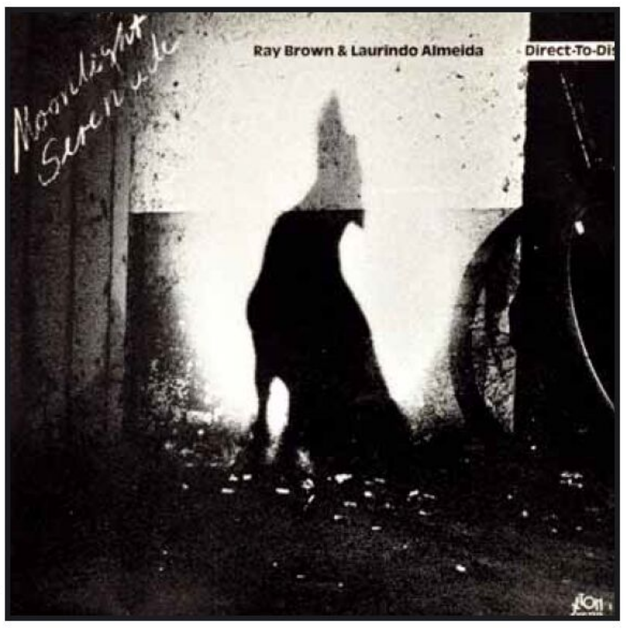
Power amplifier:
· Silvercore Collector's Amp

Integrated amplifier:
· Thivan Labs 811 Anniversary
· Yamaha Pianocraft

Competitors

Loudspeaker:
· JBL 4301B

We already know the aluminum tweeter with ceramic coating from the ES-14N



Ray Brown, Laurindo Almeida – Midnight Serenade

What we played

Ray Brown, Laurindo Almeida
Midnight Serenade

The National
Trouble Will Find Me

Ryan Adans
Live At Carnegie Hall

Wishbone Ash
Coat Of Arms

Ingredients

Epos connoisseurs will immediately notice the tweeter: The 28-millimeter ceramic-coated aluminum dome is the same as the one that gives the ES-14N its fine and energetic high range. You will look in vain for this driver on the shelves of the relevant suppliers. Like all loudspeaker chassis from the Fink universe, it is an in-house design manufactured by a specialized supplier. The quality does not result from pseudo-features suitable for brochures but from properties tailored to the application. This also applies to the brand-new 13-centimeter midbass driver of the ES-7N. Like its larger colleague from the ES-14N, its cone is made of filled polypropylene and is suspended in a soft rubber surround, which is intended to ensure maximum linearity even at higher excursions. The motor is provided by a 30-millimeter voice coil mounted on a glass fiber carrier. The magnet system is very clever: an impedance control ring minimizes distortion, and a second magnetic ring reinforces the magnetic field in the air gap. The double magnet arrangement also reduces the stray field of the magnet, which thus interacts noticeably less with the coils of the crossover. The older ones among us may remember: In the age of CRT monitors, PC loudspeakers had to be set up so that they did not produce funny colors on the monitor.

Box

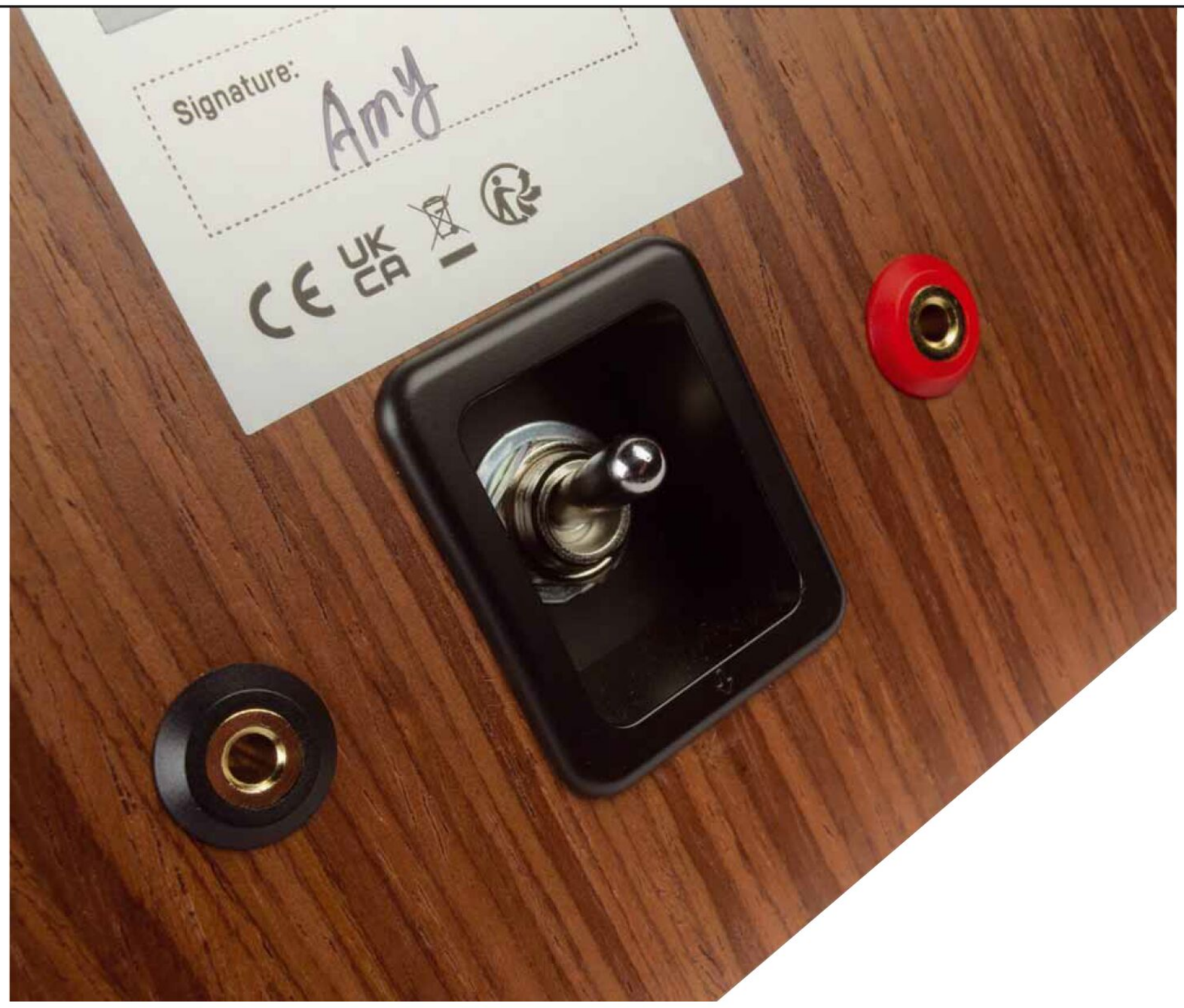
A significant part of the weight of almost eight kilograms is due to the housing. It consists of two layers of eight-millimeters-thick MDF. Between them is a highly elastic adhesive. Such „constrained layer damping“ arrangements are a specialty of Karl-Heinz Fink. A quick „knock“ on the ES-7N‘s housing immediately clarifies why. A wooden disk mounted under the lid provides additional reassurance. Incidentally, the DIY scene was delighted to adopt this trick from Fink because it means a valuable use for the otherwise useless piece left over when the baffle is cut out for the woofer. In addition, there is only a single brace between the side walls of the impressively low-vibration cabinet.

The vent also has a special feature. Fink uses a curved tube that, despite its lateral placement, ends in the middle of the cabinet and has damped ventilation holes that ensure precisely defined pressure control. The baffle‘s layout is asymmetrical, forcing the manufacturer to build a left and a right speaker. The manufacturer recommends operating the speakers with the drivers on the inside.

Crossover

Although it looks pretty simple structurally, the crossover board has accumulated a lot of parts, partly due to the switchable room adjustment. The crossover frequency between the two drivers is around 2000 Hertz. High-quality components are used across the board in the crossover. Fink only uses air-core coils and mostly custom-made non-inductive resistors.

The woofer measures around five inches in diameter and is a brand-new development for the ES-7N



The toggle switch is responsible for setting the room adjustment

The rear looks a little empty because the vent is also on the baffle

The room adaptation influences the frequency response from the mid-range upwards: in free-standing mode, the SPL is flat, while in the switch position for near-wall or shelf operation, it rises towards the top. This compensates for the „amplification“ that the low frequencies experience when the speakers are not free-standing.

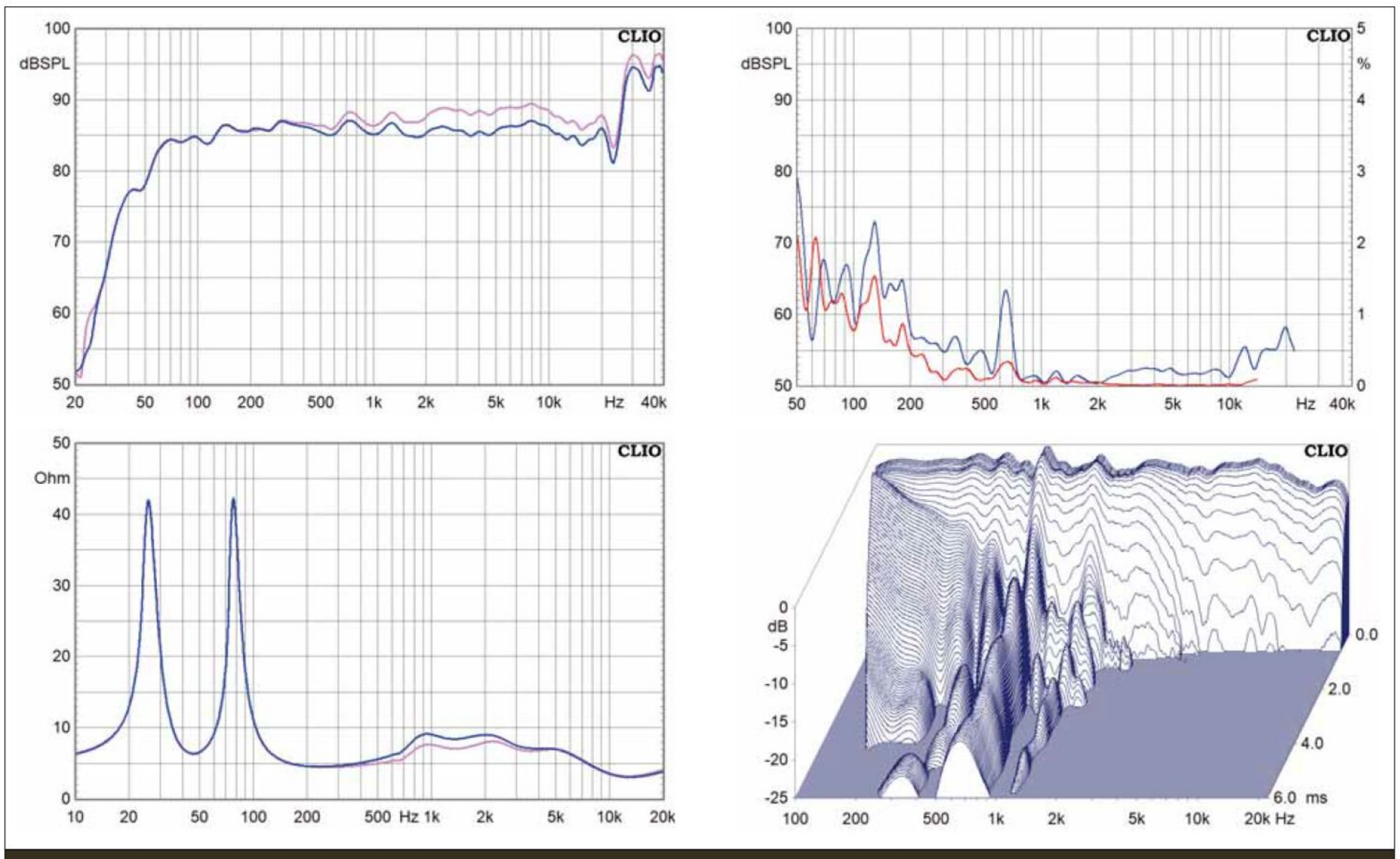
Combinatorial

The small Epos only want to be connected via banana plugs, with the simple sockets located to the left and right of the operating mode switch. It is modest regarding power consumption, as genuine 86-89 decibels of sound pressure (depending on the operating mode) are very rare for such a compact converter. It even plays with single-ended tubes of the not-too-weak-chested kind but also likes refined semiconductor concepts.

Sound

First of all, the room adaptation works very well. Standing freely in the room, the Epos has a pleasingly mature and spacious sound. Fortunately, this doesn‘t change when you put it on the shelf in the corresponding operating mode. In „free-stan-

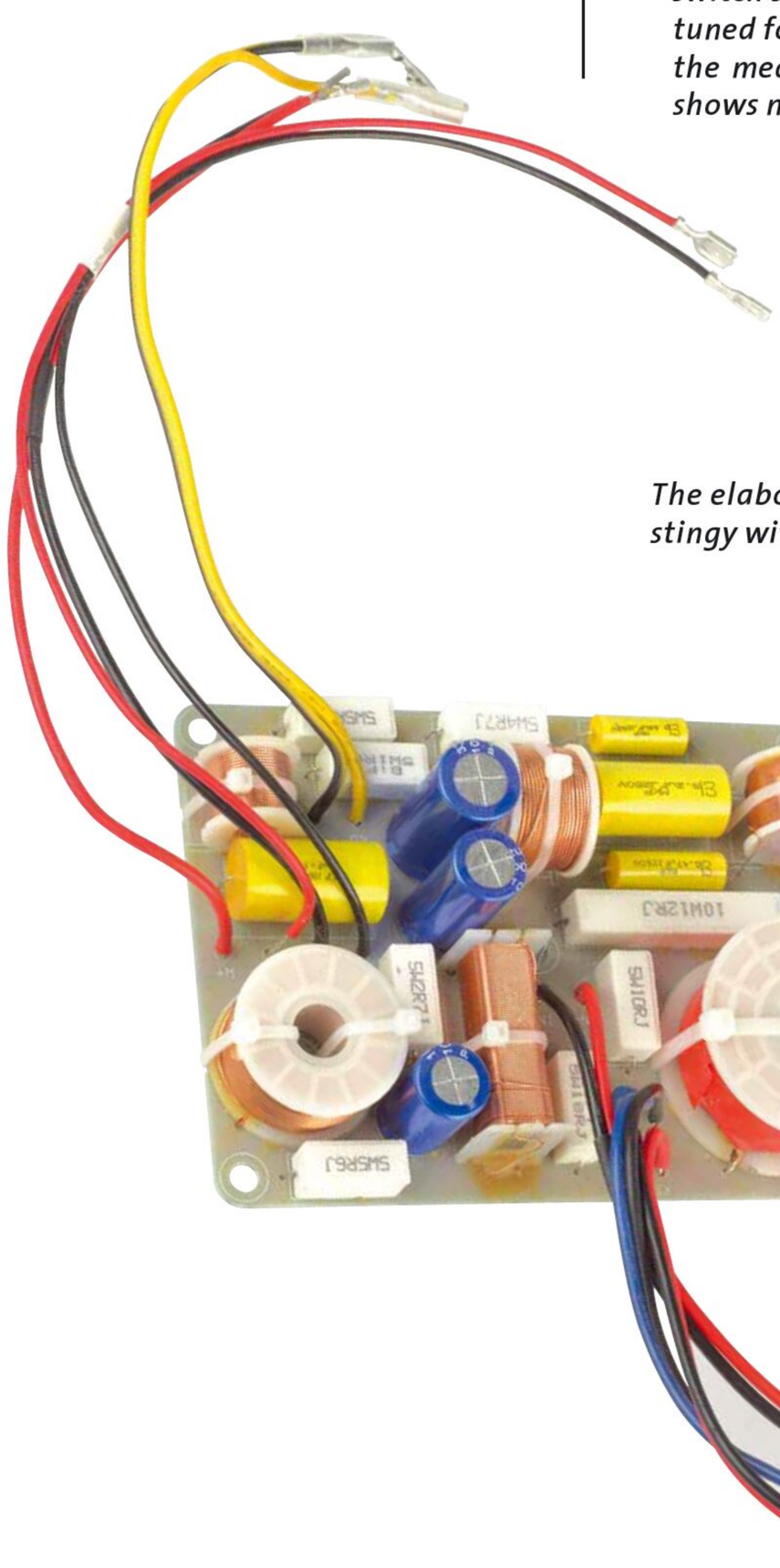
The vent is equipped with pressure equalization openings again



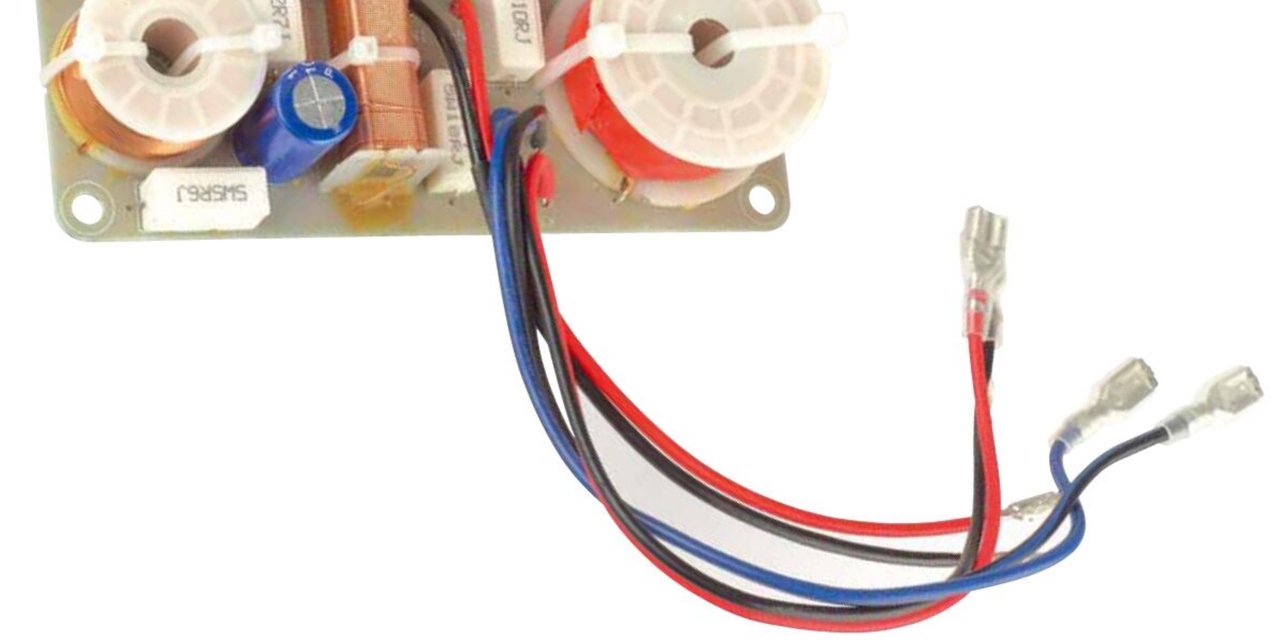
Measurements

Lab commentary

The small Epos performs flawlessly in our lab. The frequency response chart reveals the effect of the room adaptation, and in free-field mode, the SPL is very linear. The tweeter delivers a peak at around 25 kilohertz, which is irrelevant in practice. With an efficiency of 86 to 89 decibels (depending on the switch setting), the ES-7N is highly efficient, and the impedance measurement shows it to be a low-tuned four-ohm speaker with impedance linearization. It behaves excellently in terms of distortion: the measurement shows the behavior at a really loud 95 decibels of sound pressure; the speaker shows no abnormalities at this level.



The elaborate crossover is not stingy with high-quality components



ding“ mode, it becomes too grumpy and compressed for me, but the toggle switch solves the problem remarkably well and provides air and clarity. Great!

Then, the Epos replaced the much larger JBL 4301B in my second system, and I was amazed at how well the two thirteen-inch speakers held their own against the eight-inch speakers of the American classic. The speaker manages completely without an artificial „hump“ in the fundamental range, which is often used to suggest volume in small speakers. The Epos is entirely free of this and instead sounds concise, precise, and flawless in the bass; it doesn‘t even capitulate to Ray Brown‘s double bass. Amazing! The ES-7N comes across as lively and playful; it intones vocals such as those of „The National“ frontman Matt Berninger precisely to the point and opens up pleasingly large spaces. This is far more than can be expected from a speaker of this size.

Holger Barske

Epos ES-7N

· Price per pair	2,000 Euro
· Distribution	IDC Klaassen, Lünen
· Phone	+49 231 22178822
· Internet	idc-klaassen.com
· Dimensions (W x H x D)	200 x 290 x 270 mm
· Weight	approx. 7,6 kg

lp

Epos
ES-7N

International 2/24

» Superb! Precise, refined, spacious, and tonally accurate, the small Epos is a hot tip for people with limited space. The room adjustment is also a true highlight.

33
STOP
45
PE

Just listen

Friends, how time flies! Almost nine years ago, I wrote about the rebirth of Perpetuum Ebner, PE for short, and their first product, the 4040 turntable. Now, I'm curious to see how the brand-new 6060 is doing.

Always with a cover and two-part structure. The PE looks chic, especially in bicolor

History

Have you ever wondered what the designations 4040 or 6060 mean? In the PE world, they indicate a sub-chassis. But wait a minute, you don't even know PE yet? We need to change that. Perpetuum Ebner once belonged to the analog aristocracy of the German Black Forest. The company was founded as „Perpetuum Schwarzwälder Federmotoren und Automatenwerke" in St. Georgen in 1911 after the collaboration between the brothers Josef and Christian Steidinger fell out. They established the companies „Gebrüder Steidinger, Fabrik für Feinmechanik" in 1900 and Dual in 1907. In the mid-1930s, Albert Ebner married Josef Steidinger's eldest daughter and moved his gramophone factory from Stuttgart to St. Georgen. In the 1950s, PE became Europe's largest manufacturer of record players and changers, excluding England with Garrard and BSR. To get a feel for what we are talking about here, PE's daily production at the time was around 5000 units. This meant PE was larger than DUAL and ELAC in Kiel, and the three companies occupied a leading position in the global market. But within barely two decades, the analog glory ended due to wrong decisions. After Albert Ebner Jr. sold the company to DUAL in the early 1970s, the big competitor let it die: PE disappeared entirely from the market around 1973.

Spotlessly clean work: the platter turned from solid material with its targeted damping

The first new PE cartridge in collaboration with TechneAudio is a world first: the excellent MC1

Resuscitation

Alfred Fehrenbacher GmbH was the most important supplier to the major manufacturers in St. Georgen. Originally, Wolfgang Epting, a local Black Forest patriot, wanted to take over Fehrenbacher. However, his negotiations failed due to the unrealistic demands of the old Mr. Fehrenbacher. However, as Epting was friends with family members from the PE environment and even with Mr. Ebner himself, he was able to take over PE almost ten years ago, which was a real stroke of luck. After all, no business graduate or other free rider of the vinyl boom would have understood what makes up the core of the PE brand as he did – or they would have ignored it. Today, you can recognize a PE by the clear differentiation of the frame with its color and veneer variants and the dark tonearm board, accomplished particularly well on our test device with its bi-color finish. The base for the 6060 is the last independent PE 2020 from 1967. It is a matter close to Epting's heart that as many parts and services as possible come from St. Georgen or the immediate vicinity. Of course, this is not 100% successful, but that should be clear to everyone. Thanks to the manufacturing concept, you can have „your" PE customized considerably. After final assembly, each turntable is meticulously measured and finally acoustically tested with an actual record before it leaves the Black Forest.

Teammates

Integrated amplifier:
· Holborne Passion

Loudspeaker:
· MoFi SourcePoint 8

Competitors

Turntable:
· Transrotor Massimo Nero mit Transrotor Studio 12 und Figaro

Excellent craftsmanship is also evident in the bearing with the flywheel; this is how manufacturing works

Ry Cooder – Paradise & Lunch

What we played

Dexter Gordon
Something Different

Dire Straits
Same

Ry Cooder
Paradise & Lunch

Tony Scott
Lost Tapes Germany 1957 / Asia 1962

Pharoah Sanders
Shukuru

Another small, fine detail: the base plate for the motor pulley is solid and effectively decoupled

The new one

Based on the 4040, PE's bestseller, the 6060 is a classic belt-driven turntable with the PE TO 2018 tonearm, which otherwise works on the top PE direct drive PE 7070. This is where PE's modular principle comes into play, making it easy to realize new combinations of plinths, platters, and tonearms, which is essential for a small manufacturer. All PE turntables have now been converted to the MK II version, including a new motor. The Premotec synchronous motor runs more smoothly and stably than its predecessor from Papst.

Then there are the control electronics with external power supply, which were developed back in 2017 with the support of Walter Fuchs and Helmut Thiele. And yes, there is a hidden speed setting, but the rotors are perfectly adjusted and Epting wants

It just wants to play! And it does so exemplary and excellently

XLR inputs are always a good idea for a record player. Mini-XLR would be an even better one

to prevent users from turning this setting without necessity and perhaps without the possibility of an exact check. The man cares about the optimal performance of his babies. Epting has modified the classic sub-chassis concept. It is stiffer than that of a Thorens or Linn LP 12. Epting uses conical spiral springs with a diameter of 1.7 mm, which are guided via a suspension bolt and thus limit horizontal and vertical excursions. This is noticeable in the reduced „wobble“ and the less critical handling of the PE 6060. With the MK II version changeover, all PE turntables were fitted with height-adjustable feet developed in-house, constructed as a sandwich of aluminum with a squash ball with 60 Shore hardness in between. The 37 mm thick platter is milled from solid aluminum on-site and, like the steel floor pan, is damped with Sorbothane.

The tonearm

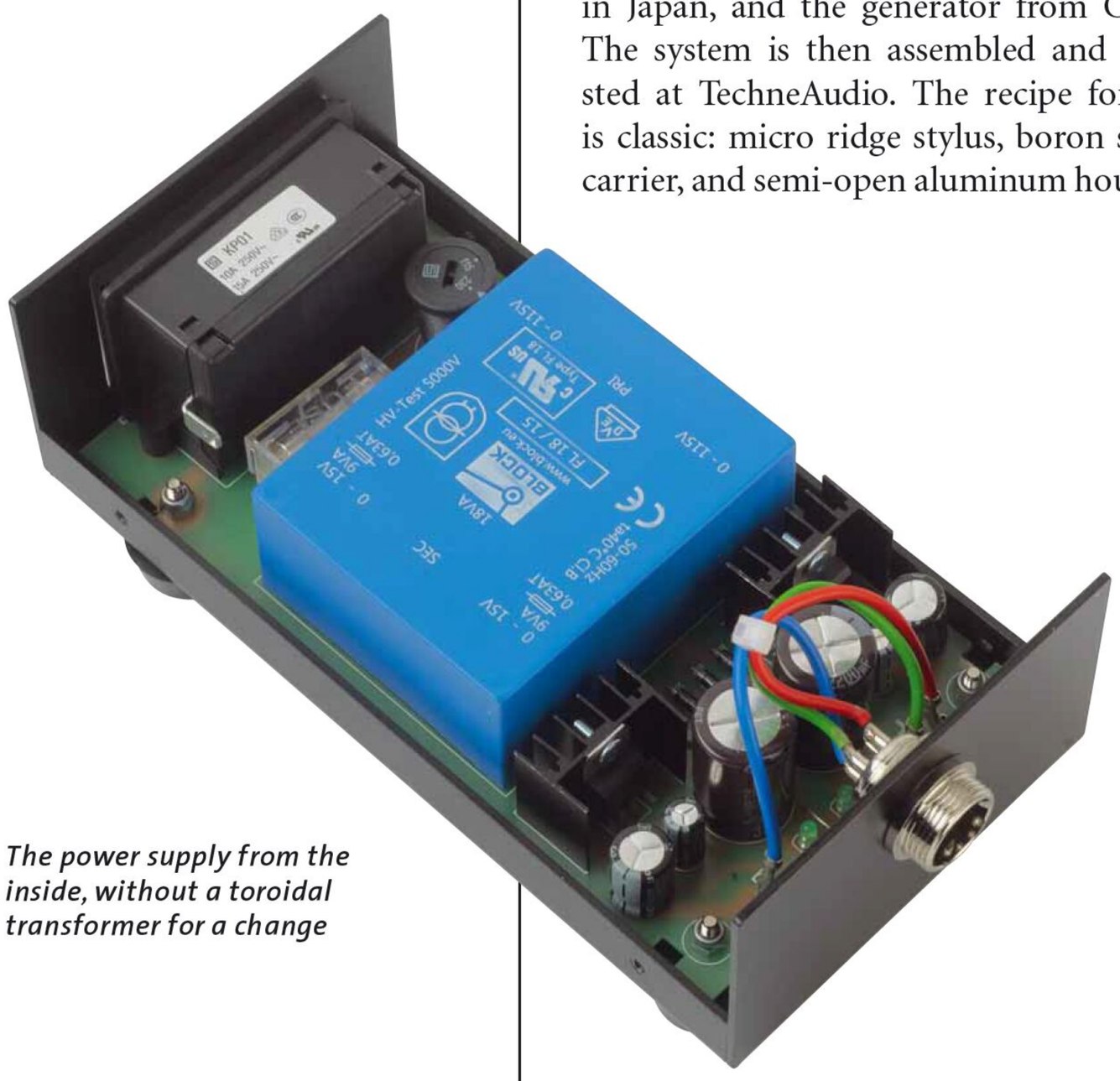
Like the well-known TP-92, which is used on many Thorens models, the PE TO 2018 tonearm was developed by WE AUDIO SYSTEMS, as Epting‘s company is called, together with a former Dual engineer in St. Georgen, where it is also built. Its geometry follows Helmut Thiele‘s, so it is slightly longer than the usual 9-inch. The tube is carbon, has classic cardanic bearings, and was initially planned to use interchangeable headshells to SME standard. However, after Jelco closed its doors as a supplier during the coronavirus pandemic, a stable, fixed headshell now does the job. None of this is rocket science, but it is well-honed analog knowledge, superbly manufactured and perfectly tuned. You can also buy the chic TO 2018 solo for EUR 1695.

This is not standard: part of the sub-chassis hangs from this solidly screwed plate: that‘s how it‘s done

Small and correct: the external power supply comes with the best reputation and clean technology

World First

As is only right and proper, Wolfgang Epting has delivered a world first exclusively for LP magazine in the form of his first own PE-MC cartridge, which, true to its nomenclature, is called PE-MC1. I thought the system would not be built in the Black Forest because its know-how is lacking there. But that‘s not true because it was developed by Epting together with Klaus-Peter Grasse from TechneAudio. The basis is their „The Beat“ cartridge, which both have refined. And guess where TechneAudio is based? Well, in the Black Forest! The needle for the MC 1 comes from Namiki in Japan, and the generator from China. The system is then assembled and adjusted at TechneAudio. The recipe for this is classic: micro ridge stylus, boron stylus carrier, and semi-open aluminum housing.



The power supply from the inside, without a toroidal transformer for a change

The square coils are not standard; they are called square coil generators. The cartridge can be bought for EUR 1749 alone. This may not be a bargain, but it is an attractive and competitive product. If you don‘t want to or can‘t spend quite that much, Epting recommends an Ortofon Quintet Black S, which is significantly cheaper in a package with the PE 6060 than on its own.

Sound

First of all, „working“ and listening to the PE 6060, its easy-to-operate tonearm and the new cartridge, is really fun. There‘s no humming, no wobbling; everything runs smoothly and noiselessly, and when the needle sinks silently into the groove, I have a permanent grin that won‘t go away. The PE 6060 and MC1 combination sounds excellent, spatially realistic, true to the tonal colors, and dynamically beautifully pronounced. How long has it been since I heard „Paradise & Lunch“ by Ry Cooder? And now I‘m seriously asking myself - why? The record is nothing short of a delight, and with the PE even more so: Jim Keltner‘s intricate grooves, Cooder‘s incomparable voice, his even more incomparable slide guitar, and the subtle Bayou music get that little bit of audiophile extra shine that makes music an experience. Cooder‘s authentic playing, which never relies on effects, should be understandable to any listener who previously thought it was mundane. And when Bobby King sings „Jesus on the Mainline“ in his divine gospel voice, one thing becomes clear: I‘m working overtime today and listening to Tony Scott’s „Germany 1957 / Asia 1962 Lost Tapes“, among others. If you don‘t know him, the man was one of the greatest jazz clarinetists and had a distinctive style. This music needs finesse and resolution, and PE has that in abundance. I keep listening and am amazed at how Horst Jankowski‘s piano chords bang into the room. This is the excellent analog school.

Christian Bayer

Perpetuum Ebner PE 6060

· Price per pair	4,925 Euro
with PE-MC1 Cardridge:	approx. 6.675 Euro
· Distribution	FLUX-HiFi GmbH / Hassloch
· Phone	+49 6324- 98977-16
· Internet	www.flux-hifi.de
· Warranty	2 years (with registration 3 years)
· Dimensions (W x H x D)	175 x 470 x 340 mm
· Weight	approx. 15 kg

lp

Perpetuum Ebner PE 6060

International 2/24

» Do you know what I like so much about PE and Wolfgang Epting's products? They are such wonderful no-nonsense products, true to the motto "It doesn't always have to be Scotland." The PE 6060 could be your next, maybe even your last, record player.

Mute
Mk-II
Phono Equalizer

Aurora with the Sun Star

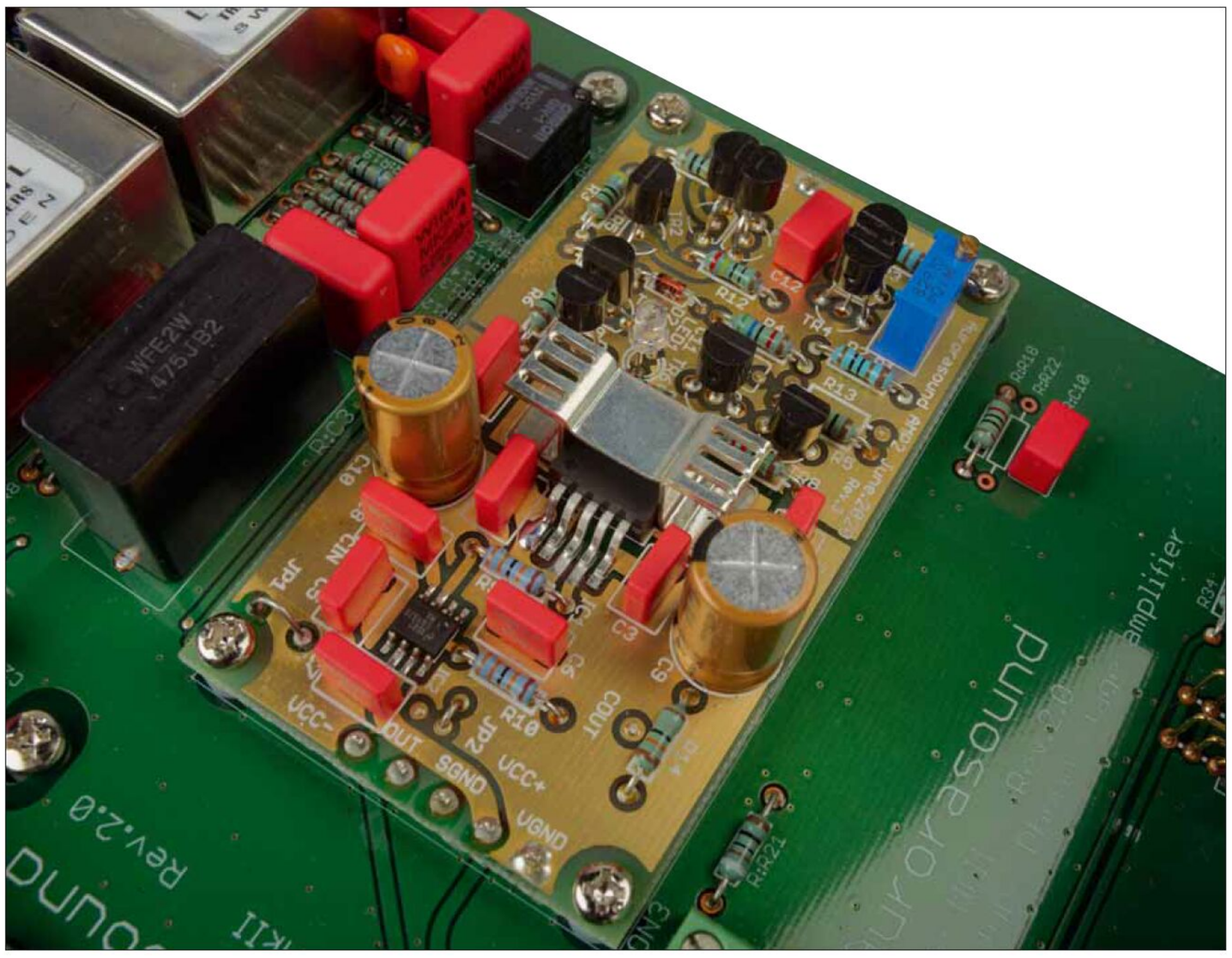
Let us not kid ourselves. At the end of the day, we like products better when we have a personal connection with them, just like this wonderfully unconventional phono preamplifier from Japan.

The not-so-large one and its small power supply. It's a good thing they don't normally stand next to each other because they don't look good together

Upheavals and certainties

We are currently experiencing another major upheaval, not only in our society but also in our industry. Companies are disappearing, and reliability and certainties are beginning to falter with them. But there are still developers who give us back the feeling that all is well. The company Aurorasound from Japan is one of them, and it has this phono preamplifier. Not only does the device sound excellent, but it also has that retro charm that is difficult to describe. It reminds me of a familiar advertising slogan from childhood: „Aurora with the sun star." When I was researching whether the company still existed, my train stopped at Cologne-Messe-Deutz. And that is when I discovered that the original Aurora mill had been grinding in Cologne-Deutz for 111 years. Coincidence or fate?

Under the heatsink in the middle sits an LM49600, otherwise used as a headphone amplifier. Here, it drives the buffer stage



History

Shinobu Karaki worked for Texas Instruments Japan for 28 years and was mainly involved in developing digital audio technology. However, as a lover of tubes and records, he privately built tube amplifiers and phono stages for local audiophiles. This generated a fanbase, and in 2010, he decided to leave Texas Instruments to found Aurorasound, based in Yokohama. Karaki-san is a multi-faceted character: an audio designer, blues musician, guitar teacher, and head of the Japanese office of DIRAC-CEVA Research, which is known for its room measurement systems. The cool thing about his company is that there can be no conflict between development, sales, and production, as he holds all the strings in his hand. He throws new products into his audiophile circles, where they are listened to and compared in detail. That can only be fun.

Devices

The Aurorasound VIDA phono stages have caught my eye with their look and excellent test reports. By the way, VIDA stands for VINYL DISK AMPLIFIER; it's as simple as that. There is the Prima, a simplified MM/MC amp that is an entry-level offering with an excellent international reputation. Then there's our MKII, which is also available in a dual mono version. And at the end of the audiophile flagpole is the VIDA Supreme with MC transformers and other options. The company also has a host of other delicacies, such as integrated tube amplifiers, preamplifiers, and power amplifiers. Or a clever little box called the „MM Expander AFE-10", which can be used to fine-tune MM cartridges - including a mono switch. And with the RIAA converter AFE-11, a crazy box that can convert digital signals to analog MM signals. In Japan and the USA, Aurorasound is known for its tube amplifiers; in Europe, the phono stages are more important.

Technologies

Karaki-san chooses special circuits, some of which he designs himself, always concerning the „golden era" of tubes and transistors and record production. But why doesn't he build tube phonos because he has no reservations about tubes? He can say quite clearly why he decided against tubes for his phono preamplifiers. This is because of the inherent advantages of semiconductors: Size, SNR, and bandwidth. However, he didn't use just any transistors; he selected excellently sounding types from NEC or Toshiba from the best transistor era between 1970 and 1990: low-noise, linear, and high amplification. He also opted for a feedback-free LCR-RIAA built with coils according to his specifications by our friend Lundahl. This is an integrated equalization with coils, capacitors, and resistors designed for 600 ohms (studio standard). An LCR-RIAA with tubes is much more complex to build and is physically much larger, which Karaki-san did not want. The advantages of an LCR-RIAA are its high resolution and low harmonic distortion, especially in the bass range. Karaki-san writes: „The sound is extremely stable over the entire frequency range, without nervousness in the peaks and without limiting the dynamics."

At the input, the famously good LT1028 op-amp takes over the amplification for MC/MM and the LCR-RIAA. The boost for MC is handled by an in-house preamplifier or head amp, the circuitry of which Karaki wishes to conceal. An LM49600 IC, an excellent headphone amplifier, operates under a heatsink. Here, it plays the role of a buffer for long cables and a low output impedance. In the output, we find the selected NEC and Toshiba semiconductors. This is not your mother's 08/15 circuit – and you

Teammates

Preamp:
· Air Tight ATC-1

Turntable:
· Garrard 401 mit Schick 12 Tonarm

Cardridges:
· Koetsu Black
· Denon DL-103 GL
· Hana Umami Blue

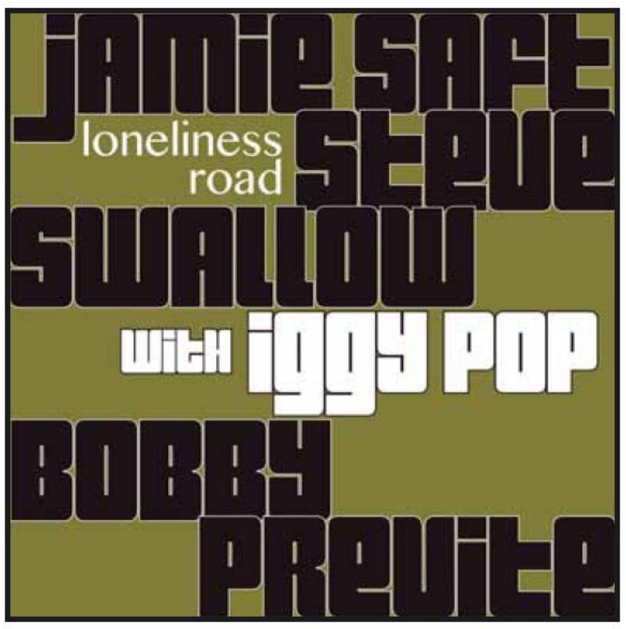
MC-Transformer:
· Air Tight ATH-3 (1:20)

Loudspeaker:
· Greenwall Ivy

Competitors

Phono preamp:
· Air Tight ATE-2005

Does that look good? Oh yes, this is what a connection panel should look like. The first buyer can determine the impedances



Jamie Safts Album – loneliness road

What we played

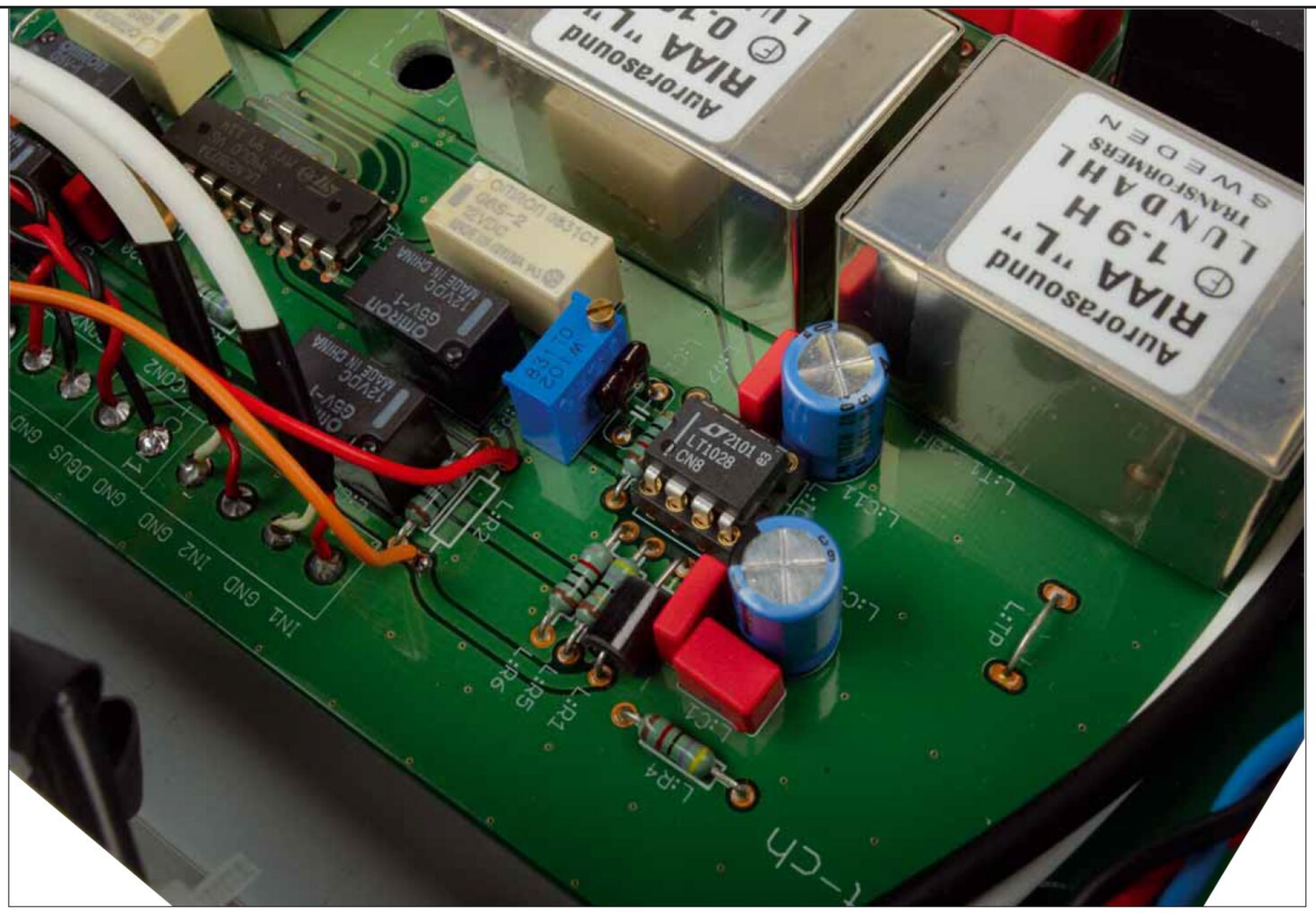
Jamie Safts Album
loneliness road

The Crusaders
2nd Crusade

Vlado Perlemuter
Ravel Piano Music Two

Chet Baker
At Capolinea

Bud Shank / Bob Cooper
Flute ´n Oboe



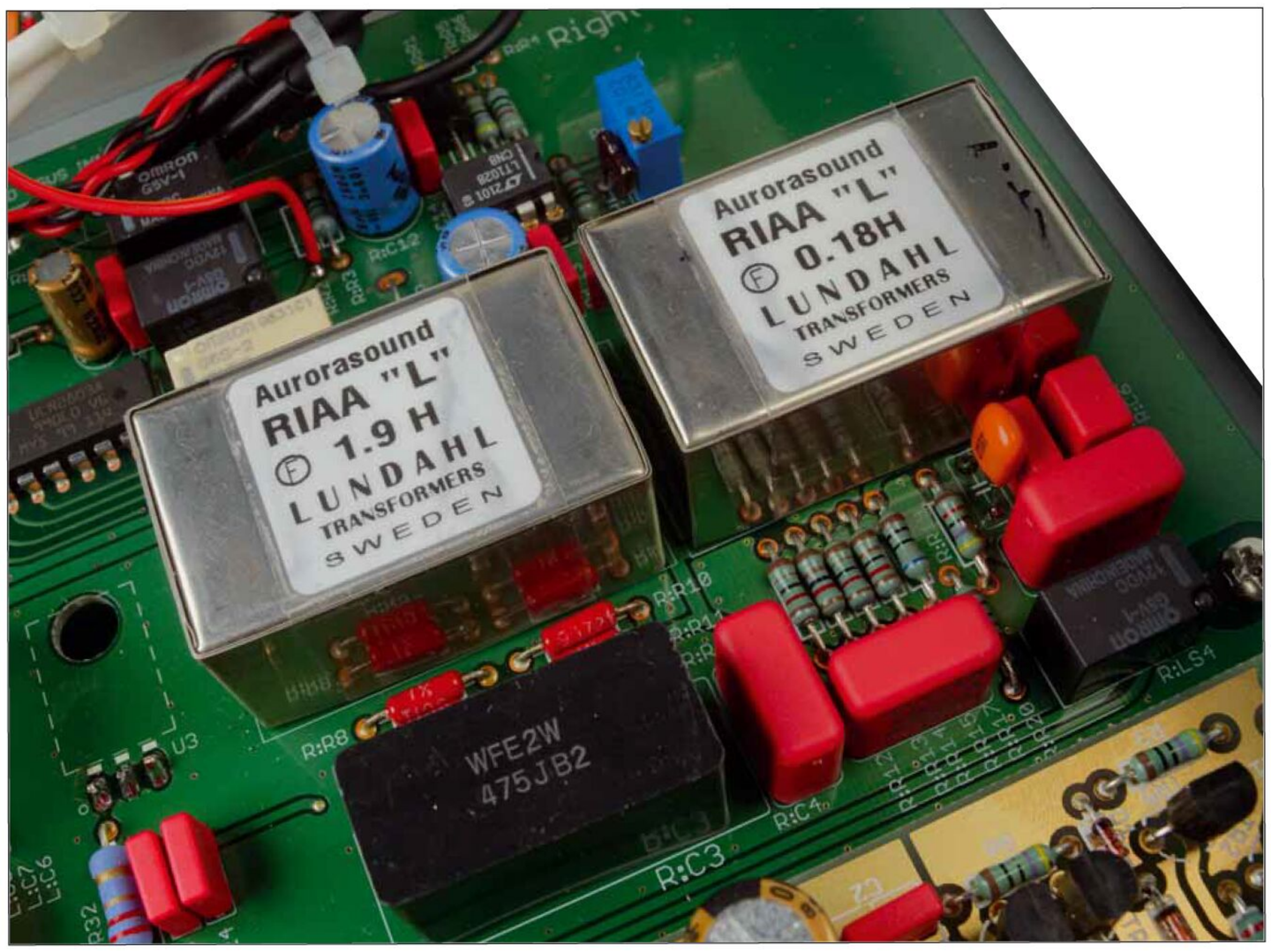
They love each other: OpAmps and Lundahl coils for the LCR-RIAA. They all contribute to the top sound

can hear it. The glorious orange button at the top left is not the on/off switch; what are you thinking? It's the mute function, which reminds you of its functionality and allows you to do all the switching and plugging work on the setup without being bothered by background noise.

Adjusted

Karaki-san has tested and listened to pretty much every top MC cartridge, all the classics, and almost any currently available.

The central element of the VIDA phono are the coils for the LCR-RIAA equalization, specially manufactured by the Swedish specialist Lundahl



The result led him to the two standard impedance values of 10 and 100 ohms, and I can only agree with him. The fiddling around with decimal places reminds me a little of the acoustic fiddling with equalizers when I first got into the subject—my conclusion: a waste of time. Yours can be completely different. Our test device has six optional values between 120 and 2000 ohms; you can specify your desired values when purchasing. The impedance is adjusted via resistors. The input impedance can be varied for MM cartridges, and capacitances can be switched. There are also a Degauss function, a mono switch and a subsonic filter – all practical and welcome functionalities. Like the output, the two inputs can be configured for RCA or XLR as required.

Getting down to business

When I test new components at home, I do it the most straightforward way: plug it in, play it, do something else, and see what happens. If nothing happens, well, then I have to dig deeper. If something happens - all the better. Here, it clicked immediately: a coherent sound, free of noise and thoroughly engaging, transparent, open, lively, and natural. When you don't just nod appreciatively but start listening and suddenly hear records that you thought were good but perhaps not outstanding, with a new awareness, it gets really good.

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Sonoro | SONY Spectral | Tivoli
Vogels | Wharefdale | YAMAHA

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Carbon EVO

Pro-Ject
Pick it PRO

Pro-Ject
RecordMaster II

Pro-Ject
T1 Phono SB

Pro-Ject
X2

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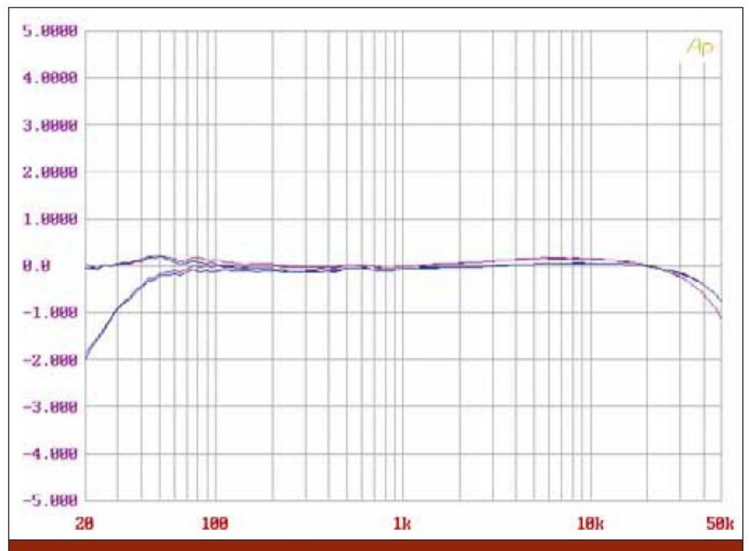
Excellent, channel-separated design. You can see the effort involved with the four LCR RIAA coils. You can also hear it



Measurements

Lab commentary

The Aurora also delivers a flawless performance in the measurement laboratory. The frequency response resembles the standard curve and extends well above 50 kilohertz. The graph shows the influence of the well-dimensioned subsonic filter, whose 3-decibel point is still well below 20 hertz. The device amplifies MM signals by 40 decibels and MC signals by 65 decibels. The signal-to-noise ratios (MM/MC, 5/0.5 mV) are 68 and 53 decibels(A), respectively; the channel separation under the same conditions is at least as high. The distortion (also under the same conditions) is 0.035 and 0.057 percent, respectively. The power consumption is a constant 10.4 watts.

I used to listen to some tracks from Jamie Saft's album „Loneliness Road" repeatedly, others not at all. Now, I listen to both records in one go. His piano strokes sound natural, hyper-dynamic, and deeply located in space. Plus, that inimitable creamy electric bass sound of Steve Swallow. While tidying up, I recently found a concert card 1980 from the John Scofield Trio, on which Swallow thanked me for my enthusiasm. It's been a long time, and now, after Swallow's solo, I hear extra crisp drum breaks with wonderfully colorful and dynamically incorruptible cymbal hits. And the icing on the cake, even if you don't associate it with him, are the vocal parts by Iggy Popp, who has become such a wonderful old-age crooner. This double LP alone would be reason enough to buy this phono preamplifier. But that also applies to every other record and cartridge I've heard with this device. The Koetsu Black convinced me just as thoroughly as a Denon DL-103GL or the Hana Umami Blue. And no matter whether I was enjoying Chet Baker's soft trumpet tone, snapping my fingers to the fluffy soul jazz arrangements of the Crusaders, or marveling at the hard-hitting piano chords of Vlado Perlemuter. With the VIDA MK II, I felt as safe as in my audiophile mother's womb.

Christian Bayer

Clean power supply design with filtered IEC input. Only the 220 volts should have been increased slightly for today's mains supply

Aurorasound VIDA MK II VI-6

· Price	4,990 Euro
· Distribution	Musikae / Frankreich
· Internet	www.musikae.fr
· Warranty	2 years
· Dimensions (W x H x D)	100 x 260 x 2500 mm
· Weight	approx. 3 kg
power adapter	approx. 1,4 kg

lp

Aurorasound
VIDA MK II VI-6

International 2/24

» The Aurorasound VIDA MK II is a highly competent, sound-wise outstanding phono preamplifier with a wonderful retro charm. Definitely one of my favorite devices.

Surprise Bag

Does the name Audes sound familiar, but you can‘t quite put your finger on it? Perhaps that is because the company had a somewhat heterogeneous profile that has since become almost magically streamlined.

The extremely powerful and good-sounding mid/bass driver comes from Audes‘ chassis production: it‘s a real cream of the crop

Surprises

Routine is a great thing in my job, but I really enjoy discovering completely new brands or experiencing familiar brands in a new way. When I received the M2, I had never heard a single thing about or through Audes‘ loudspeakers. When I spoke to TCG sales manager Eckard Derks about this, I realized why. He had tried in vain for more than ten years to establish the brand as a loudspeaker authority. Perhaps it did not work because of the confusing Audes loudspeaker portfolio. But then the company came onto the market with mains and power conditioners, and suddenly, it was judged anew because of their qualities – and so were its speakers.

Unusual

The M2 is visually striking. A product designer is responsible for the looks, which must be examined closely to fully understand the design. We had wondered whether the solid base column might contain some kind of bass boost using a transmission line or similar sound guide. But the column is a column – but it also is not. Usually, a monitor sits on such a stand or column, and it does so here, too. But it is only slightly protruding, which makes the whole speaker look more like a full-blown floor-standing type. The M2 cabinet has an exciting design, especially because you do not recognize it at first glance, as the chief developer at Audes, Aleksei Turin, explains. Audes uses a relatively new material called „Solid Surface“ for the cabinet. This is a mix of materials that is mainly used in modern bathrooms for floors but also for bathtubs and washbasins: resilient, hard, flexible, and durable. Specifically, it is a customizable mix of natural minerals, pigments, and resins. The material has excellent formability when it is warm, and damage can be perfectly repaired using an invisible welding technique to create seamless designs.

On a secret mission. With a cover, the product design of the Audes M2 really comes into its own and gives it a very special touch

Development

About five years ago, the Estonians began experimenting with new materials from the solid surface family. The first product was the 106 monitors or, as some used to say, „shelf speakers“. They compared the result with their standard models made entirely from medium-density fiber (MDF). The sound difference was so big that they realized this had to be their new path. The higher density and greater rigidity of the solid surface materials also have a positive influence on the cabinet design. The Audes engineers experimented with shaping under heat and then veneering the cabinets, cutting them with CNC machines, dyeing them, and painting them. They did everything necessary to find out whether the materials were suitable for production because they planned a completely new speaker line. Overall, it took three years from the initial ideas to the finished products.

Inside and outside

As already indicated, the housing of the M2 is a very interesting construction. The aim was to create a minimalist look that integrates timelessly into modern living environments. It makes sense to construct a base and not bring a stand into play, which could disrupt the visual aspect. This may sound confusing, as you might wonder what the M2 is: a monitor on a stand or a floor-standing speaker. Well, ultimately the cabinet consists of three parts, but they are firmly connected to each other. The upper section with the speaker chassis consists of thermally molded solid-surface material. The middle section, which is the stand, is MDF and houses the crossover. The aim of the material mix is to avoid negative microphonic effects. Finally, there is a base plate, again made of solid-surface material, adding stability to the construction. The plate is coated with Nextel to visually match the drivers. But that‘s not all: the upper two sections are elaborately cross-braced for several good reasons. Firstly, because this makes sense anyway, to increase the rigidity of the cabinet and to counteract the rear energies of the drivers. Contrary to its homogeneous design, the M2 has an unusual bass reflex tuning. In contrast to the usual design, it points forward but is oriented downwards towards the foot, making it largely independent of the position of the speakers, which can, therefore, also play very close to the wall. Normally, the positioning of bass reflex designs depends on the reflex port. The outlet port is also not straight, and it is not just one port – there are five small ones. It is a good thing I asked because, of course, you cannot see any of this from the outside.

The drivers

The Estonians take a two-pronged approach to the loudspeaker chassis. They source the tweeters from SEAS because they could not build them any better. They are by no means alone in this, as many renowned companies, such as DeVore Fidelity from the USA, use SEAS models developed for them. Audes are no exception, although

Teammates

Turntable:
- Transrotor Massimo Nero with Transrotor Studio 12 and Figaro cartridge

Phono preamplifier:
- Moonriver 550

Preamplifier:
- Accuphase C-3900

Power amplifier:
- Accuphase A-300

The connection panel is dominated by elegant WBT terminals and relies entirely on single-wiring

Nils Økland / Sigbjørn Apeland – Mica

What we played

Elvis Costello / Burt Bacharach
Painted from Memory

Nils Økland / Sigbjørn Apeland
Mica

John Scofield
Uncle John´s Band

Friedrich Gulda
Beethoven piano concertos

A compact monitor and not. The Audes M2 defies all categorization and impresses with its fantastic sound

in this case, they have used a standard part that exactly meets their requirements. The cone material is aramid fibers, „Sonomex," to be precise, and is driven by a neodymium magnet. Like many other drivers, Audes manufactures the mid/bass driver itself as an OEM product for the industry. It is a variant of their 40W65-8 model, the parameters of which have been adapted to the M series. Like many manufacturers I like, Audes uses a coated paper cone. What exactly they use for the coating, and how much of it, remains their secret. In addition, there is a classic ferrite magnet, the sound merits of which have long since returned to the consciousness of loudspeaker developers, if they ever disappeared there. It is a classic design that is simply very well-made. Audes acquired the expertise for this during the Soviet occupation when it was a necessity to be able to produce as much as possible in-house. This included membra-

SEAS manufactures the dome, which is one of the best on the world market. Here embedded in an aluminum waveguide. It sounds excellent

ne production, the art of making suspensions for them, winding coils, or getting the frames into the right shape. Today, some of these steps are outsourced to other companies, and the know-how and knowledge of what they want is present.

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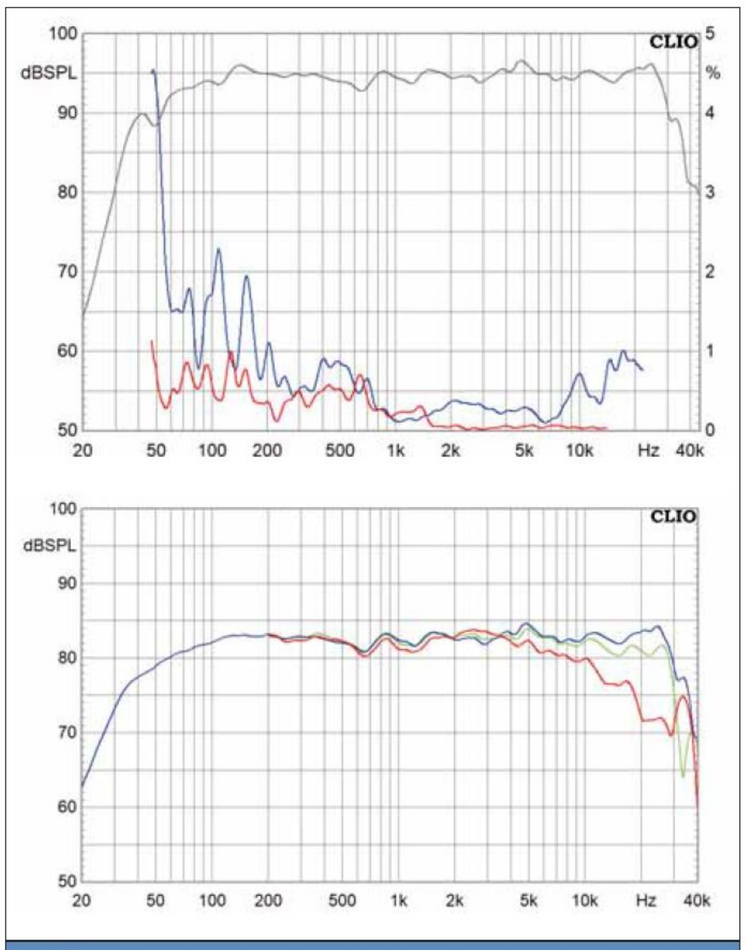
The longer you look at the Audes M2, the more the design wins out. The speaker is visually and acoustically a real specialty

Allocations

The crossover design follows logical and pragmatic parameters: the drivers are measured in the enclosure, then they simulate different options in terms of both slope and component selection. Finally, a prototype of the crossover is built, and the measurement process is repeated. Now the team listens to the whole thing. If everyone is satisfied, bingo. According to Aleksei Tyurin, this rarely happens; the process usually must be repeated several times before the actual crossover emerges. In the case of the M2, it is divided into 18db for the high pass and 12db for the low pass. The crossover is set low at 1100 Hz. The coils are wound in-house, and foil capacitors and ceramic wire resistors come from specialists.

Music at last

At first, I did not expect anything outstanding in terms of the sound of the Audes M2, but then I was surprised as rarely before: by its sound, the size of its imaging, its ability to span a wide space, its finesse, and its level of stability. But first things first. I take a chance and play one of my „lonely island records“ by Elvis Costello and Burt Bacharach. With „This House Is Empty Now,“ I get a lump in my throat and goosebumps; it sounds so beautiful, so „right,“ and big, and takes over the whole room: there is only music and emotion, unbelievable. Then I must add my latest find, the essence of the 30-year collaboration between Nils Orland and Sigbjörn Apeland, called „Glimmer“. The title track immediately brings tears to my eyes: what is going on? The delicacy of the violin playing hits me directly into the heart. The harmonium provides the basis, and I sink into this timeless music, which gives me a feeling of infinity. The electronics also deserve a mention, consisting of a large Accuphase chain, the Moonriver 505 Phono, and the Transrotor Massimo Nero.



Lab commentary

Lab commentary

The visually exceptional M2 from Audes is rock solid in terms of measurement technology. Its amplifier-friendly minimum impedance of 6.3 ohms at 180 Hz makes it a problem-free playing partner, while the cabinet tuning to a low 35 Hz despite the petite mid/bass driver makes it broadband, as befits a monitor. As always, what suffers from the wide bandwidth is the characteristic SPL, which here is only 83 dB / 2.83 V / 1 m, so a little amplifier power is required for satisfactory operation of the M2. The crossover frequency can be located at a low 840 Hz, but this in no way drives the speaker into increased distortion – on the contrary, it remains clean also at higher listening levels, as shown here at a remarkable 95 dB / 1 m.

But the M2 is not only capable of delicacy. On John Scofield's new masterpiece „Uncle John's Band,“ I was first enchanted by Billy Stewart's delicate ride cymbal hits on „How Deep.“ They come at me with such presence, such a woody tone, and so delicious that I am tearing up, and I think I could touch the drum skins: I feel like I am at a private concert. And what kind of groove is served up to me on „TV Band,“ how casually does Stewart celebrate his second line beat, and how grippingly does Scofield dig into the song? And I kept thinking that I would not need any „more“ speakers.

Christian Bayer

Audes M2

· Price per pair	10,000 Euro
· Distribution	TCG / Nordhorn
· Internet	www.tcg-gmbh.de
· Warranty	5 years
· Dimensions (W x H x D)	252 x 1105 x 2903 mm
· Weight	approx. 20 kg

lp Audes M2

International 2/24

» The Audes M2 has been one of the biggest surprises since I started my passion for Hi-Fi. It can do practically everything I want from a loudspeaker – and more. Above all, it can give you the joy of music – or give it back to you.

Old Friends

Well, that's how it was: The aim was to test Burmester's impressive second-largest floor-standing loudspeaker, BC150, for the current issue of our loudspeaker yearbook. However, Berlin kindly sent us an extremely powerful pre/power amplifier combination to adequately drive the transducers—this one.

The 218 is Burmester's largest stereo power amplifier of the new generation

The long-standing Berlin-based manufacturer can be accused of all sorts of things but not of being overly hectic regarding model changes. It is available with either a built-in phono MC, phono MM or D/A converter module. We are testing the MC version. The 088 is a top-line device, meaning there are two other series beyond this, the „Reference“ and „Signature“. However, the 088 is undoubtedly a sophisticated machine, reflected in its retail price of EUR 25,000. And after spending a lot of time with the machine, I was pleased to discover that it is still as up-to-date as ever: Even more than 15 years after its market launch, the device has lost none of its relevance. The 218 amplifier is the larger of two models that are the really hot stuff at Burmester. Both are part of the Reference Line and are technologically based on the

Rear of the power amplifier? Perfectly tidy

Both devices only have XLR connections

top-of-the-range 159 model. They are intended to replace the 911 MK III and 956 MK II models, which have been in production for over 30 years and are still in the lineup but are likely to disappear sooner or later. The 218 changes hands for EUR 35,000 and qualifies as a powerful amplifier for all occasions, which is not afraid of difficult loads either.

The preamplifier 088

Studying the 088 is a journey back to the better days of hi-fi, a time when, despite all the efforts, there was still a certain pragmatism, and the hunt for ever-more-adventurous designs was not an end in itself.

The 088 is a compact, stylish, and pleasant device that sounds excellent and is much more than it seems in many respects. It is operated either on the device or with the precision full-metal remote control, which is included in the scope of delivery. Seven source devices can be connected, and only symmetrical connections are available. A very elegant green dot matrix display, the brightness of which can be adjusted, is responsible for communicating with the user.

The 088 is packed with electronics right down to the last corner and, apart from the power supply and control section, has a consistently channel-separated design. All inputs are buffered directly behind the input jacks. Switching is partly electronic, partly with relays. Burmester is reluctant to show its cards, so the type designations of almost all the exciting components have been removed. The two „X-AMP 2“ modules, which form the heart of the signal processing, deserve special attention. They consist of 11 individual transistors and an operational amplifier that most likely serves as a DC servo and perform their duties under a cooling aluminum sheet. The vo-

Teammates

Turntable:
· Transrotor Massimo Nero

Cartrigde:
· Transrotor Figaro

Phono preamp:
· Musical Fidelity NuVista Phono

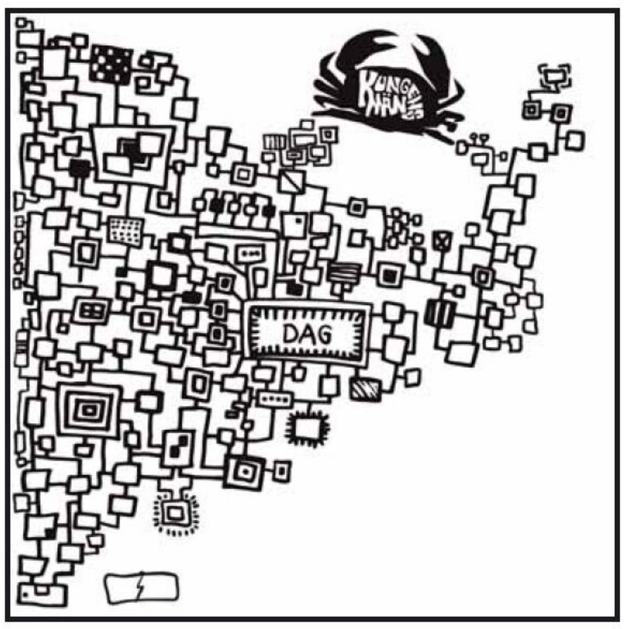
Loudspeaker:
· Burmester BC150
· Fyne Vintage Fifteen

Competitors

Preamp
· Accuphase C-3900

Power amplifier
· Accuphase A-300

The 088 has been around for over 15 years but looks surprisingly fresh



Kungens Män – Dag / Natt

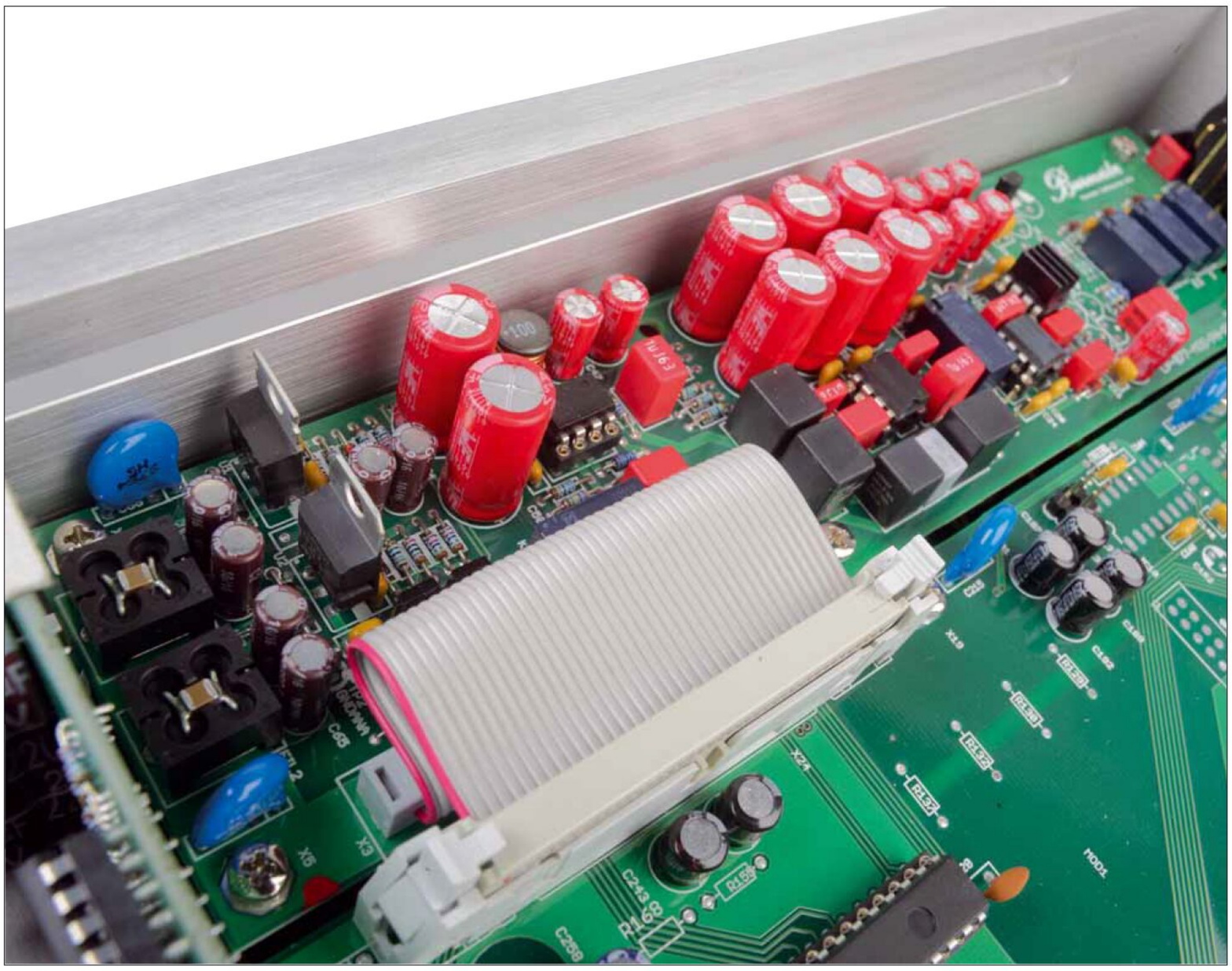
What we played

Kungens Män
Dag / Natt

Isao Suzuki Trio
Blow Up

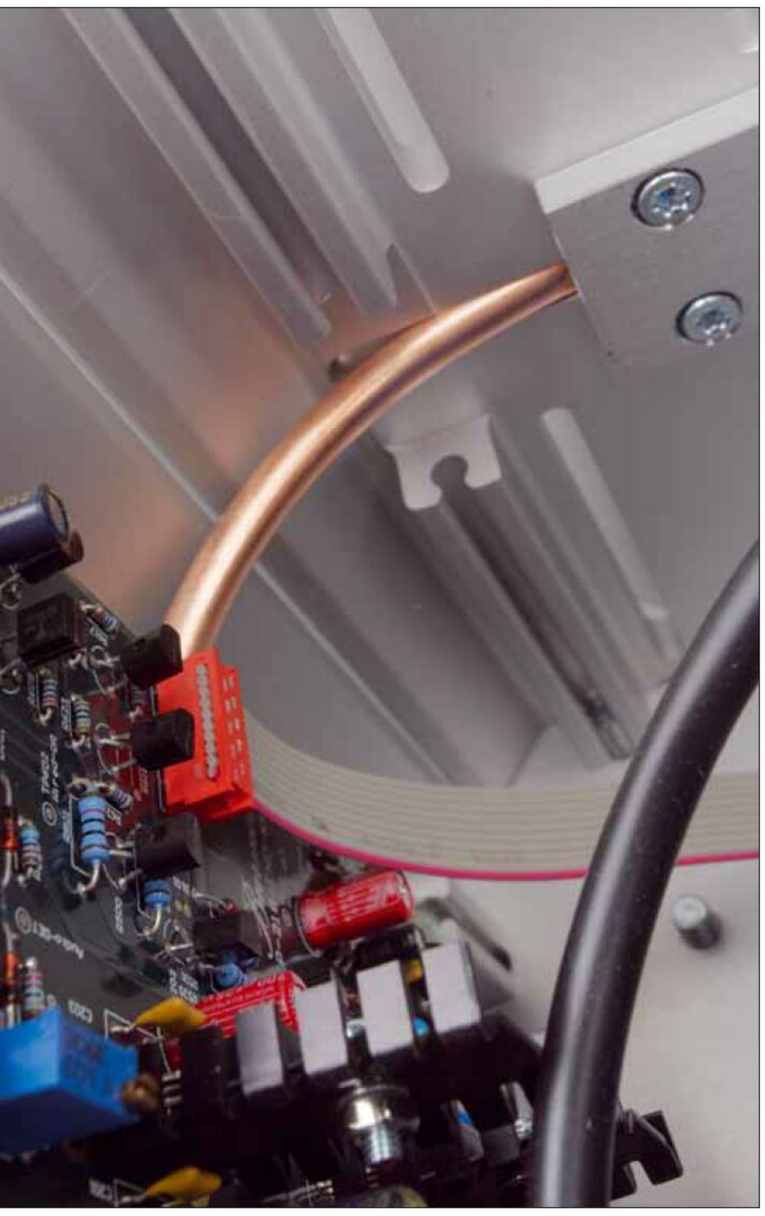
Stanley Clarke
S/T

VA
Audiophile Analog Collection Vol. 1



Like the rest of the preamplifier, the phono module, with its consistently channel-separated design, was very pleasing

Heat pipes ensure heat distribution in the 218

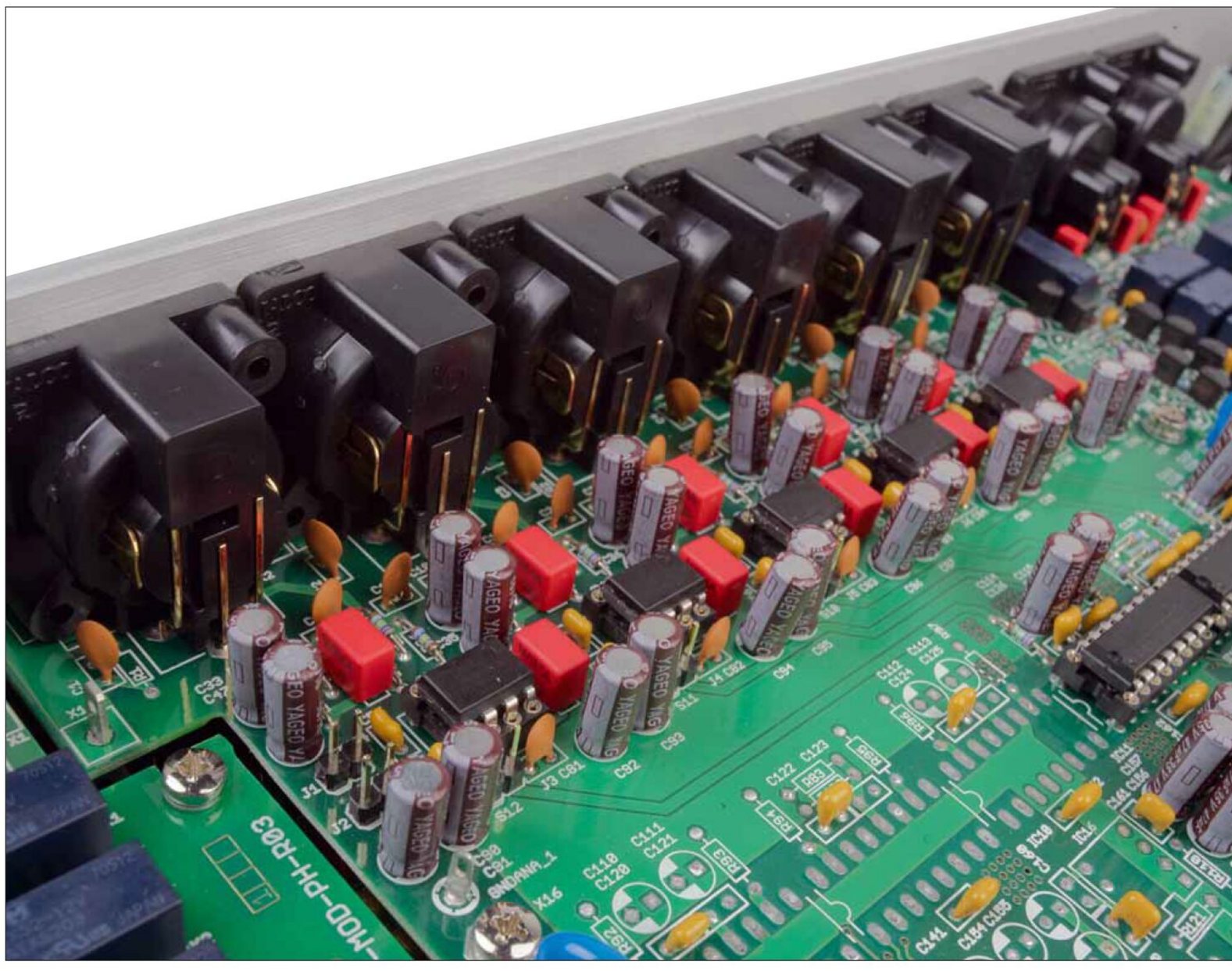


lume is set electronically in 60 levels and is controlled by a plug-in board labeled „LP-077-VOL-PGA-R03“. For those in the know, this means that this module is also used in the larger 077 model and that a PGA chip from Texas Instruments is likely to be working on it.
Enough of the investigative game. The arrangement is uncompromising, very well thought out, and measures up excellently. This also applies to the MC module, which is realized in double mono. It can be parameterized via the device‘s user interface. Four gain settings between 54 and 72 decibels and six practical input impedances between 33 ohms and 47 kiloohms are available.

The amplifier 218

The Berliners would have continued to build their successful 911 MK III and 956 MK II amplifiers for all eternity. Still, at some point, the unavailability of components puts a stop to everything. A new generation of amplifiers was, therefore, a necessity. Their first incarnation was the mighty Monos 159, which stood out not only for their sheer physicality but also for their slightly different design: The all-round mounted cooling profiles, specially manufactured for Burmester, are now kept in check visually and haptically by protruding device bases and lids. On the one hand, this considerably reduces the risk of injury and, on the other, creates an exceptional aesthetic that reminds me a little of ancient Greek temples.
The 218 is the larger of the two stereo versions derived from the flagship monos. With an output power of 160 watts into eight ohms and 270 watts into four ohms, it is ideally equipped for all situations, especially as unconditional stability was one of the design specifications. The developers did not rely on the panacea of quiescent current: the 218 is content with a relatively low Class A component in the output power. This is reflected in a low power consumption of only around 65 VA without modulation. The only time the aluminum castle of truth heats up to any significant degree is when the 218 is really „ given a good work-

Volume and input selection with fine rotary knobs that only switch control voltages

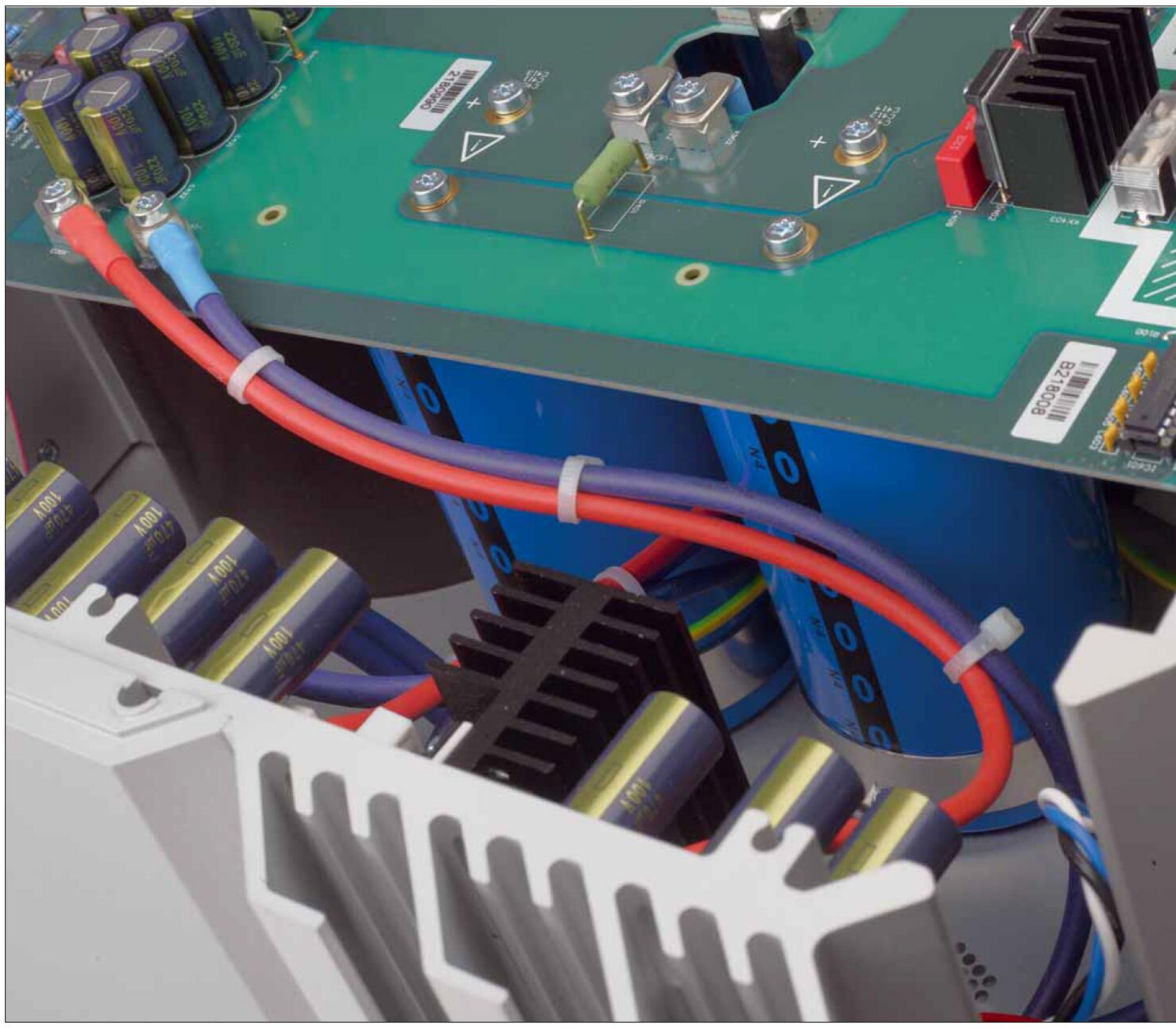


Burmester buffers each preamp input separately directly behind the socket

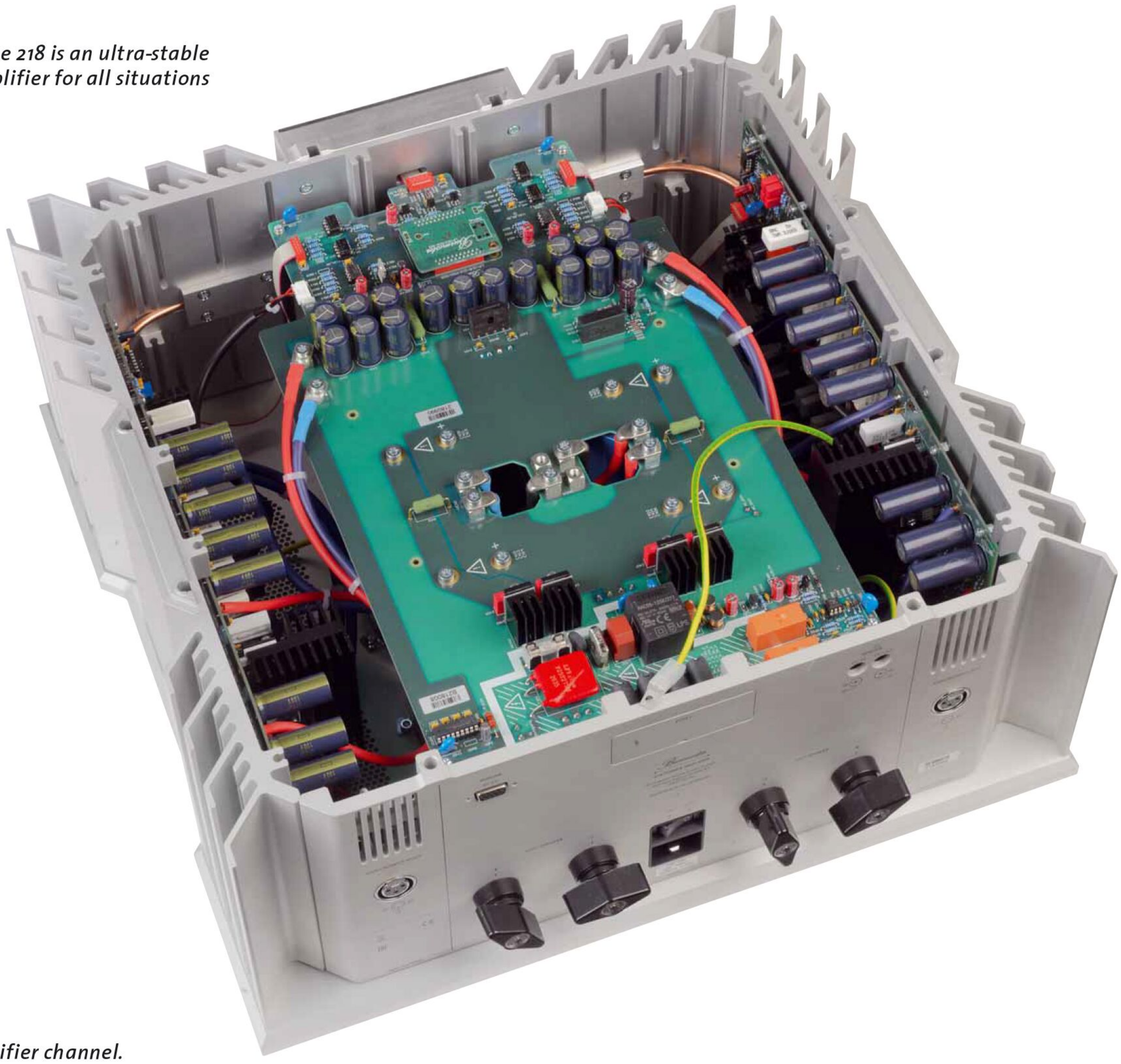
out“ over a more extended period. No problem, because the entire housing acts as an extremely powerful heatsink.

A look inside reveals how this works. Liquid-filled „heat pipes“ distribute the heat from the two power amplifier modules on the right and left of the housing to all relevant metal parts, ensuring perfect thermal balance. At the center of the device is a confidence-inspiring toroidal transformer supported by an equally generously dimensioned armada of electrolytic capacitors to provide the operating voltages. When it comes to the amplifiers themselves, it is noticeable that the Sanken ring emitter transistors that have been favored for decades have had to give way to newer types - the reasons for this can be found above.

A range of protective circuits protects the 218 against all kinds of mischief. It is switched on with an unspectacular round button on the top of the front panel, and an inrush current limiter ensures that the house fuse does not go into overdrive.

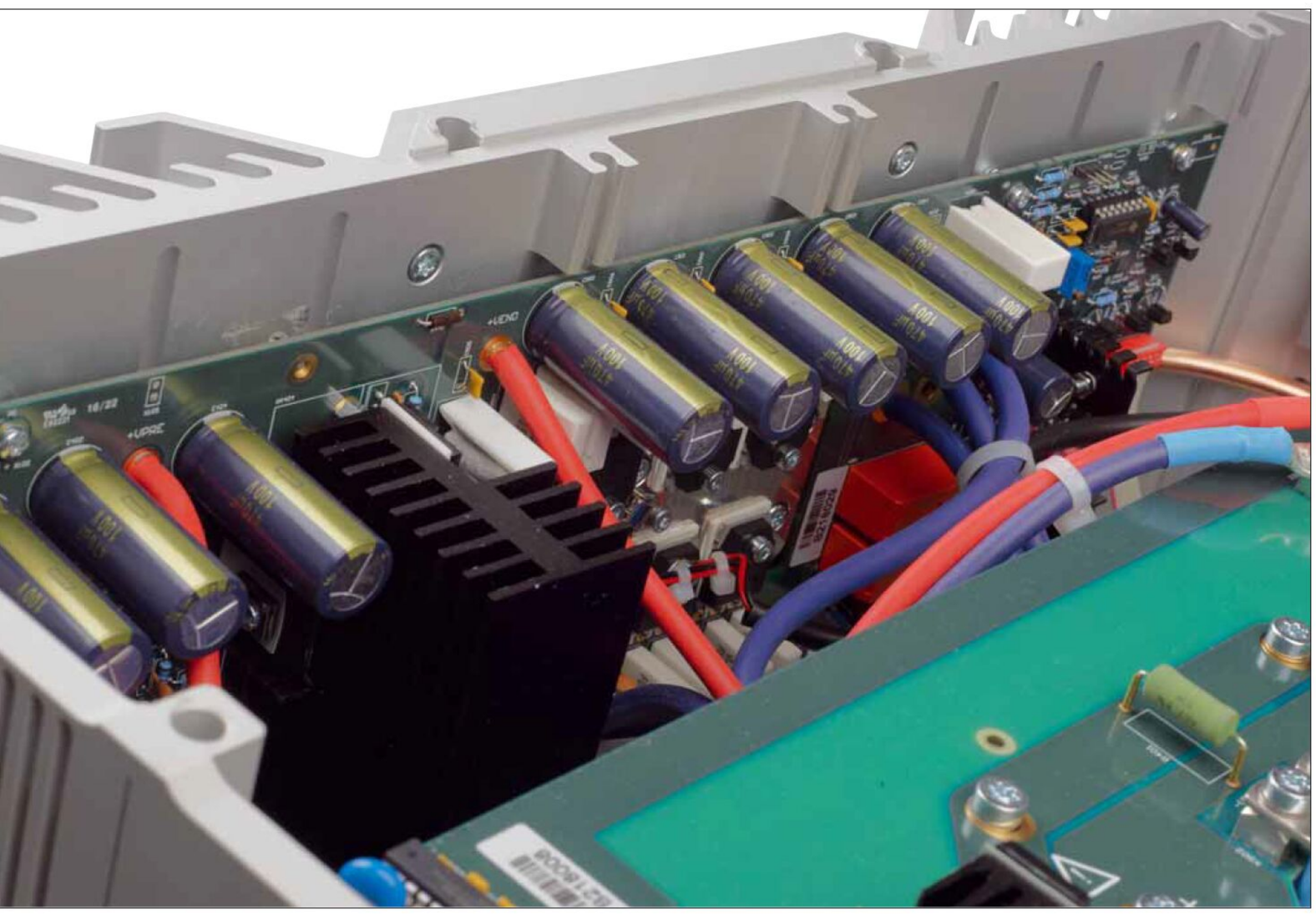


Extremely powerful power supply components under the circuit board



The 218 is an ultra-stable amplifier for all situations

One amplifier channel. Unfortunately, not too much is visible here



Sound

The sonic signatures of the preamplifier and amplifier are surprisingly similar. You could almost think that this was done on purpose. Joking aside, both 088 and 218 stand out with a decidedly contoured and firm reproduction. They allow deep insights into what the source delivers. Anyone expecting a Teutonic, bone-hard sound stands corrected: 088 and 218 provide an incredibly intense and vivid reproduction. Just the thing for the atmospheric wizards of the Swedish Kungens Män, who present us with a beautiful all-day trip on „Dag / Natt," in which they have tried to capture the moods of every time of day. It only works if the chain plays along. Interestingly, this works both with the giant BC150 in-house loudspeakers and with the incomparably more sensitive Fyne „Vintage 15". The Burmesters manage to reproduce

AUDES

DESIGN AWARD 2024

PRODUCT OF THE YEAR

Audes M Serie der neue Maßstab

Audes M 2

Conclusion
The Audes M2 is one of the biggest surpise since I startet listening to Music. It can do virtually everthing I want from a speaker and more.
Above all, she can give you the fun of music or give it back.

Christian Bayer, Lautsprecher Jahrbuch 24

Audes M 5

Conclusion
After decades of listening to even expensive speakers, I can lean out to say:
The die Audes M5 is so good, that their price is almost cheap, but their class should scare the top dogs.

Christian Bayer, LP 03/24

TCG Handels GmbH
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Tel. 05921-7884927
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PRODUCT OF THE YEAR

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P-2
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P-1G

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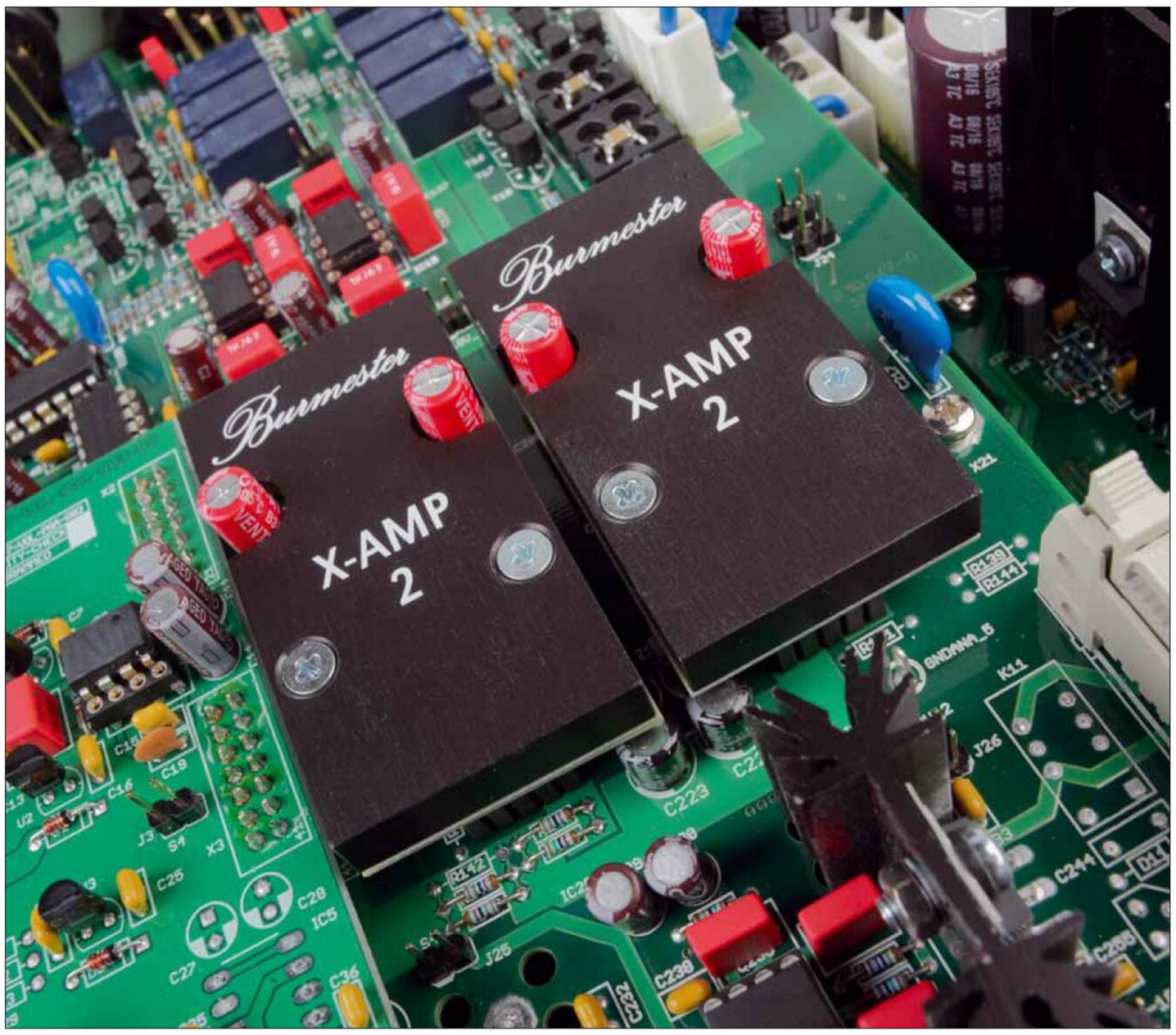


The X-Amp modules form the heart of the voltage amplification in both devices

Measurements

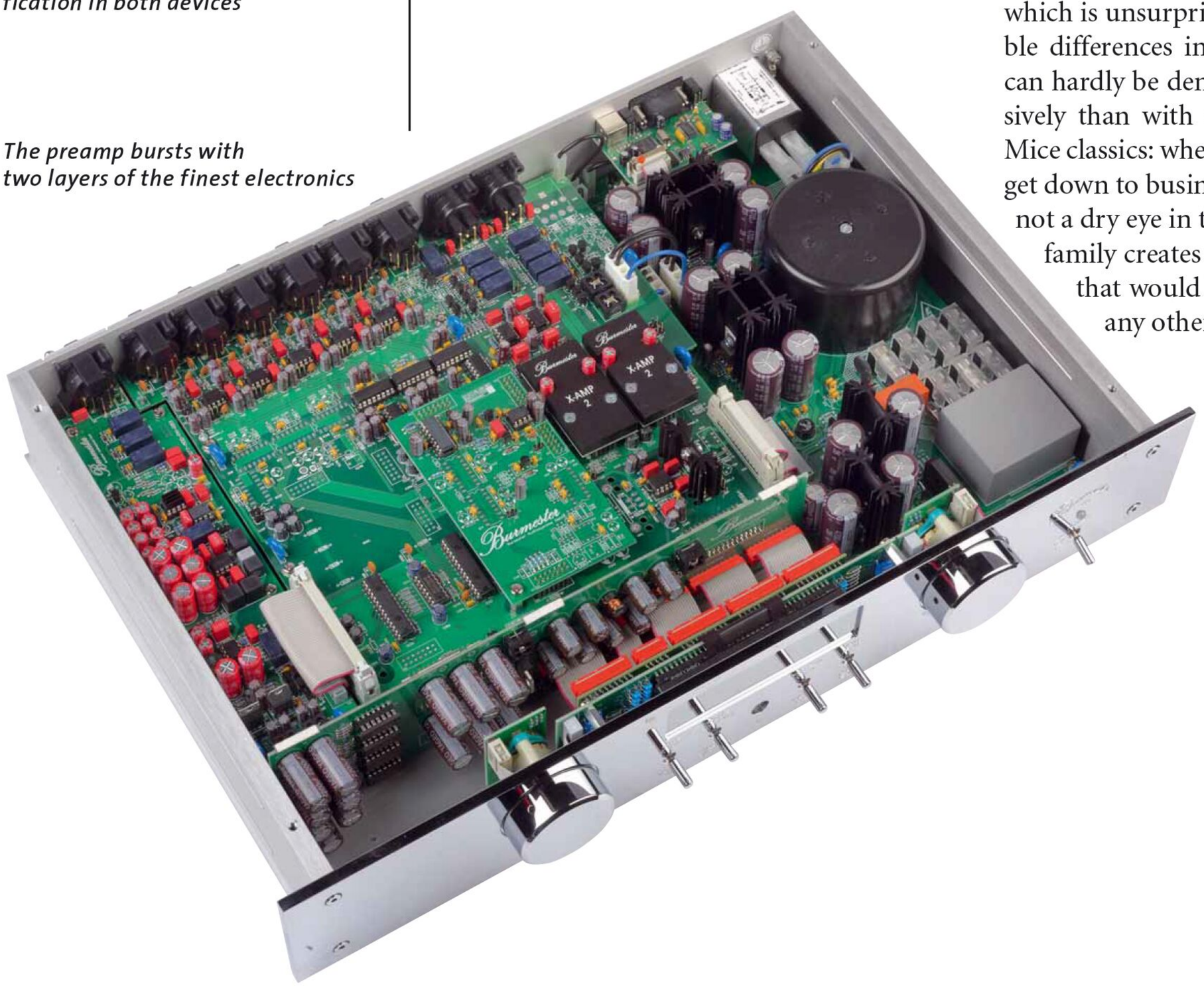
Lab commentary

As expected, the Burmester devices also earned top marks in the laboratory. Both devices deliver dead straight frequency responses with virtually no channel deviations between 10 hertz and at least 150 kilohertz. The preamplifier achieves a signal-to-noise ratio of 106 decibels(A) and a channel separation of 86 decibels(A) at one-volt input and output, with a distortion of a tiny 0.0024 percent. The amplifier's very high gain is striking, delivering one watt at the output at an input voltage of just under 70 millivolts. We measured a signal-to-noise ratio of -88 decibels(A) and a channel separation of at least the same level. The distortion at one watt is 0.048 percent. With a distortion limit of one watt, the device delivers 160.4 watts into eight ohms and 270.1 watts into four ohms.

and differentiate moods ideally. They play freely and without limits on both transducers, providing a transparent stage panorama and great spatial depth. The Accuphase top combination of C-3900 and A-300 sounds smoother, primarily noticeable with the Fyne. The 218 likes to be pushed, which is unsurprising given the considerable differences in quiescent current. This can hardly be demonstrated more impressively than with one or two Three Blind Mice classics: when Isao Suzuki and his trio get down to business on the BC150, there's not a dry eye in the house. The Burmester family creates an explosive atmosphere that would be difficult to achieve by any other means.

Holger Barske

The preamp bursts with two layers of the finest electronics



Burmester 088 / 218

· Package price	60,000 Euro
· Distribution	Burmester, Berlin
· Internet	burmester.de
· Warranty	2 years
· Dimensions (W x H x D)	309 x 1433 x 601 mm
· Weight	approx. 180 kg

lp

Burmester
088 / 218

International 2/24

» An extremely transparent preamplifier with an excellent phono section and an amplifier that sounds ever more monstrous the more you push it: Burmester's current generation of amplifiers is perfectly equipped for all eventualities.

HOLD TIME
∞
∞ 50
0 0.00

The Divine

This is an opportunity I have been waiting for forever.
It is a look at the Accuphase product range from the side
that average earners are usually denied.
This review is about the flagship power amplifiers from Yokohama.

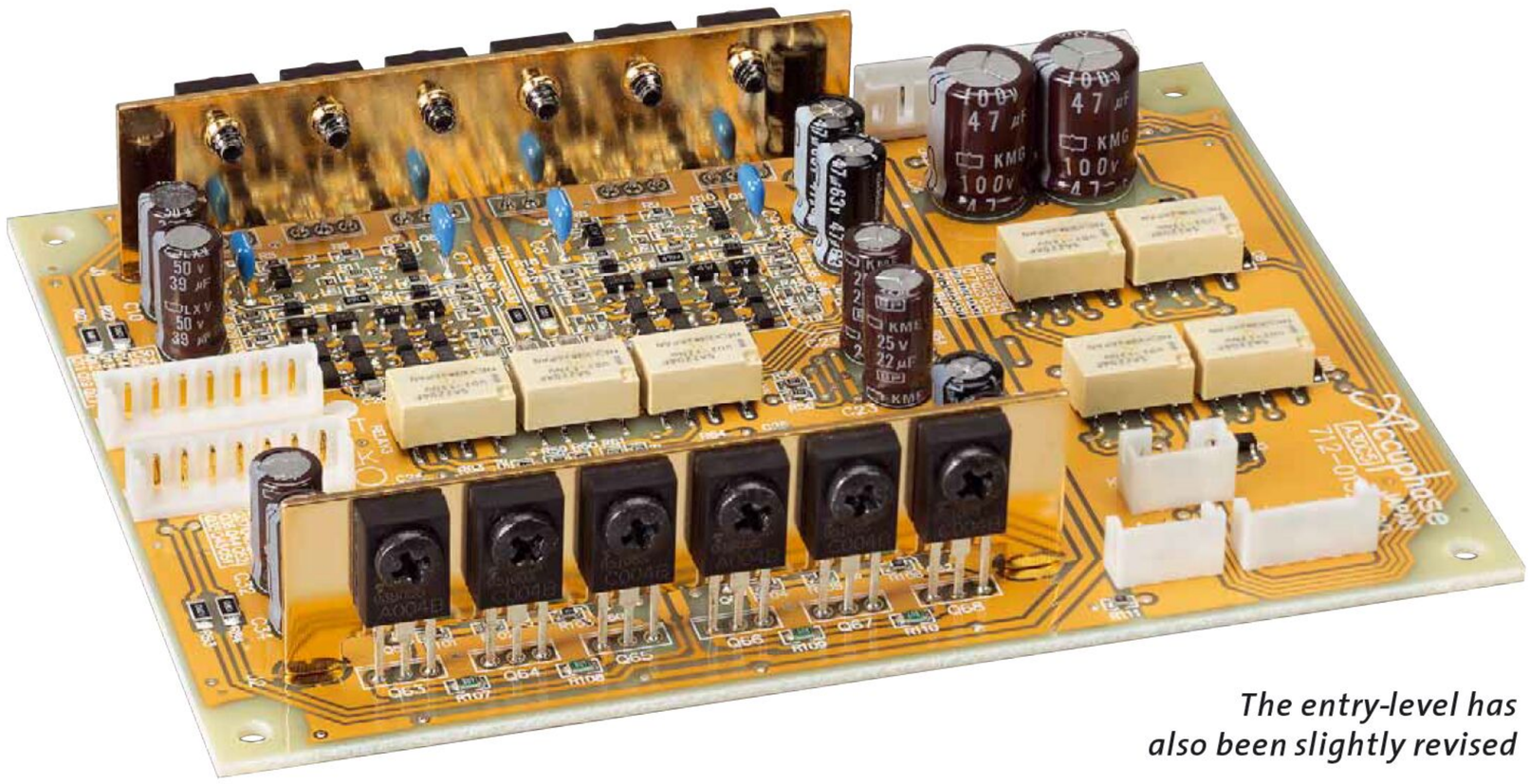
The „face“ of the A-300 hardly differs from its predecessor model

Historical

The sizeable mono power amplifiers are almost every electronics manufacturer‘s end of the line. This makes perfect sense because, at a certain point, a power amplifier concept can no longer sensibly fit in a single housing; space and weight considerations simply put a stop to it. Of course, the masters of the finest amplifier technology at Accuphase also bow to such adversities. Until recently, the company had two elaborate two-pack models, one with a little more power but a little less quiescent current and a Class A model, trimmed uncompromisingly for sound. On the occasion of the company‘s fiftieth anniversary two years ago, a whole series of new models were presented, and finally, it was the turn of the Class A monos to be revised. The A-300 is now the undisputed leader in the Accuphase power amplifier hierarchy; Class AB monos are no longer in the range.

Two of these modules work in parallel and form one channel of the A-300

My last intensive contact with Accuphase amplifiers of this caliber was almost 25 years ago. Back then, the objects of desire were called M-2000, and I remember spending many enthusiastic hours with them. Surprisingly, little has changed visually a quarter of a century later: the A-300 still has the typical „form factor“ and the unmistakable „face“ that characterize these



The entry-level has also been slightly revised

amplifiers. The central display instrument may do without pointers these days, but it still maintains the classic look in an exemplary fashion. While amplifiers from pretty much all manufacturers have become bigger and bigger, and it's hard to get away without high-rise towers these days, the highly ambitious new Accuphase mono amplifiers also take up the classic quarter square meter of floor space and are content with a height of 24 centimeters. These are by no means small amplifiers, but in this respect, they also offer the subtle understatement that has always characterized Accuphase devices.

In contrast to the A-250, the mains transformer of the new top model is located at the front of the housing

Teammates

Turntable:
· Transrotor Massimo Nero / Studio 12"

Cartridge:
· Transrotor Figaro

Phono preamplifiers:
· MalValve preamp three phono

Preamplifier:
· Accuphase C3900

Loudspeaker:
· Wilson Audio Sasha V
· Fink Team Borg Episode 2
· Fyne Audio Vintage Fifteen

Competitors

Amplifiers:
· Burmester 218
· Yamaha P-2200

Walcott / Cherry / Vasconcelos – Codona 2

What we played

Walcott / Cherry / Vasconcelos
Codona 2

Isao Suzuki Trio / Quartett
BlowUp

Truckfighters
Mania

Chet Baker
Chet

Of course, at around EUR 46,000 per pair, the devices are not a special offer, but they maintain the price level of their predecessor, the A-250, and are thus far from the price regions that can be achieved elsewhere for something like this today.

Fundamentals

As usual, the manufacturer is very cautious with its output power specifications. The A-300s deliver a stable 200 watts into eight ohms and 370 watts into four ohms. If more is needed, two monos can be bridged to drive even the most misconstrued speakers. A quiescent current consumption of 226 watts (per channel!) is a sure indication of an extensive Class A range. Regarding measurement technology, the A-300s are simply the best I have ever had on the lab bench - see „Measurements.“ Of course, one can combine the A-300 with extremely low-impedance loudspeakers; the manufacturer specifies the device for one-ohm loads.

Operation

Accuphase offers a fantastic range of features, even in a simple mono power amplifier. This starts with the dual-level display with an LED chain and a five-digit seven-segment display. Of course, both can be configured in various ways using the switches located behind the massive flap under the display cut-out. Yes, there is multi-stage switchable input sensitivity and the choice between XLR and RCA signal input. No other manufacturer is anywhere near as consistent as Accuphase when it comes to these things.

The rear continues just as consistently. The colossal speaker terminals are suitable for bi-wiring ambitions, and there are also two input sockets – in case you want to loop the signal through to a second monoblock in bridge mode. Is there a polarity switch for the XLR connections? Of course.

The new housing cover is also visually striking. Accuphase has opted for a black anodized finish on a lightly brushed surface, as with all anniversary devices.

Technology

The A-300 is a careful further development of the A-250. 40 neatly selected MosFets provide the power in each unit. Twenty of these are arranged on each of the stately side heatsinks. Accuphase has built two complete amplifiers here, with outputs only brought together at the speaker terminals. In the latest incarnation of this idea, the voltage amplifiers have also been moved to the power amplifier boards, so they are now duplicated, further reducing residual noise compared to their predecessor. Accuphase calls this „double multiple current summing.“ In principle, it should be possible to reconfigure this amplifier into a stereo version with minimal changes. A cautious glance at the brochure of the brand-new A-80 confirms this assumption.

Accuphase has also made minor improvements in every other area. They no longer switch amplifier output signals with relays but with low-loss and wear-free MosFets.

The lid of the A-300 is a brushed, black, anodized aluminum sheet, which is also new

Here, even lower impedance types are used, which has further improved the device's damping factor.

The power supply has undergone a 180-degree turnaround. On the A-250, the massive transformer was still located at the back of the housing, and the two robust filter capacitors were at the front behind the front panel. The situation on the A-300 is precisely the other way around. I could imagine this could also have gained a decibel or two in signal-to-noise ratio. Of course, there have also been a few detailed improvements to the current feedback architecture of the input amplifier assembly – all within the framework of the careful Accuphase evolution.

I can dispense with the comment that every detail has been considered and implemented with extreme consistency, as this is the norm at Accuphase and also applies to the entry-level integrated amplifier. What is different is the result that can be achieved with it.

The protection circuit board works with very low-resistance MosFets and a flat-wire air-core coil

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Sound

A good reason for testing the A-300 was the presence of various sophisticated loudspeakers in the editorial office that demanded uncompromising control. I was particularly looking forward to the combination with the Wilson Audio Sasha V. And whether it was this one, the Fink Team Borg Episode 2, or the mighty Fyne Audio Vintage Fifteen (which is far too efficient for such amplifiers), the result is the same every time: it sounds incredibly fluid, smooth, polished, and completely detached from the speakers. The last time I experienced a similarly dense atmosphere in the sound spectacle on „Codona 2“ was with the Air Tight 211 mono amplifiers, which left a lasting impression on me. Amazingly, two semiconductor bolides can get down to business with similar delicacy and sensitivity. Forget all the attributes commonly associated with the term „high-performance amplifier.“ The A-300s are the exact opposite. Here, every watt is at the service of musical expression and relaxation. And not even extreme Japanese jazz cult label Three Blind Mice sounds particularly brutal or energetic but simply realistic – the approach to a real live experience works surprisingly well. The A-300s also deliver their unique emotionality with rougher material: the guitarist of the Swedish stoner rock experts „Truckfighters“ demonstrates just how much density and energy can be packed into a single riff via his Orange stack playing live on stage – at home, please only use these incredible amplifiers.

Holger Barske

Measurements

Lab comment

In the lab, the A-300s consistently deliver excellent results. We won't bother with the frequency response diagram; it's a straight line anyway, and the upper cut-off frequency is 80 kilohertz. They deliver 200 and 370 watts into eight/four ohms, which is enough for all situations. At five watts at the output, the signal-to-noise ratio is an enormous 116 decibels(A); there is no channel separation because the amplifiers are mono. The distortion factor at five watts is a tiny 0.0018 percent; the values are practically identical at four and eight ohms. A monoblock consumes 226 watts at idle and 785 watts at total output into four ohms.

The connection panel offers everything the audiophile heart desires

Accuphase A-300

· Price per pair	46,000 Euro
· Distribution	PIA HiFi. Weiterstadt
· Phone	+49 6150 50025
· Internet	www.pia-hifi.de
· Warranty	3 years
· Dimensions (W x H x D)	465 x 240 x 515 mm
· Weight	approx. 46 kg

lp

Accuphase
A-300

International 2/24

» Space, expression, virtuosity, stability, brilliance, variability – amplifiers could not sound better. The A-300 sets standards, and that is with almost any loudspeaker.

The almost complete system

Norbert Lehmann ranks it in the "preamplifier" category. Which I think is a pretty merciless understatement.

Lehmannaudio

Classification

I am more comfortable with the in-house headline „Minimalism redefined“ on the Phonolith
product page, because that is exactly what the latest device from the Cologne-based manufacturer Lehmann Audio is, sitting on the borderline between studio and home audio applications. The largest device that has ever left the Lehmann factory is the top-of-the-range „Silver Cube“ phono preamplifier, which is pretty much content with a DIN A4 footprint. Since the company was founded in 1988, Norbert Lehmann has resisted the temptation to break into the realm of the monster high-end with huge metal castles and secure his company‘s minimum annual turnover with three units sold (unlike many of his competitors).

And so his latest creation once again presents itself in the form of two deep units with minimal front panel dimensions. One houses the rather luxurious power supply, the other a true universal talent. It contains a preamplifier, an MM and MC-compatible phono preamplifier and a powerful headphone amplifier. And if the rear panel hadn‘t already been packed with the necessary sockets, there would certainly have been a D/A converter as well (pure speculation on my part). In the simplest case, you plug in a record player and headphones and you have a fully-fledged hi-fi system. If you want, you can connect a streamer or CD player to the high-level input and double the number of sound devices. If headphone operation is not for you, plug external power amplifiers to the pre-out connections that supply the speakers.

Operate on top of each other? Can you also

The blue film capacitors are in the equalization

The Phonolith is a combination of tried and tested assemblies

The Phonolith thus qualifies as a pretty grown-up control center for an entire, if there is no need to operate a sprawling array of devices. From this point of view, the purchase price of 2800 euros seems quite civilized.

Operation

With such a minimalist concept, the number of controls is naturally limited. There is the obligatory volume control, which is easy to operate thanks to the solid aluminum rotary knob and the attached blue ALPS potentiometer. The toggle switch a little further to the left selects between high-level and phono input, next to it is the 6.35 mm stereo headphone socket. On the rear panel there are the required three pairs of RCA sockets, which are arranged in a somewhat criss-cross pattern due to the very limited space available. There is also an earthing terminal and a four-pin XLR socket for connecting the power supply. There's even more to report from the underside of the device. There are a total of six „mouse pianos" peeking through the bottom panel, which can be used to parameterize the device. Two dual blocks allow you to select the high-level amplification (0, 10, 20 decibels). Switch block „B"

Teammates

Turntable:
· Clearaudio Master Innovation / Universal / Skyanalog G-1

Preamplifier:
· NEM PRA-5

Active crossover:
· JBL 5235

Power amplifiers:
· Atma-Sphere Class D
· Yamaha P-2200

Loudspeakers:
· JBL 4355

Competitors

Phono preamp / headphone amplifier:
· Clearaudio Balance Reference

UFO – UFO1

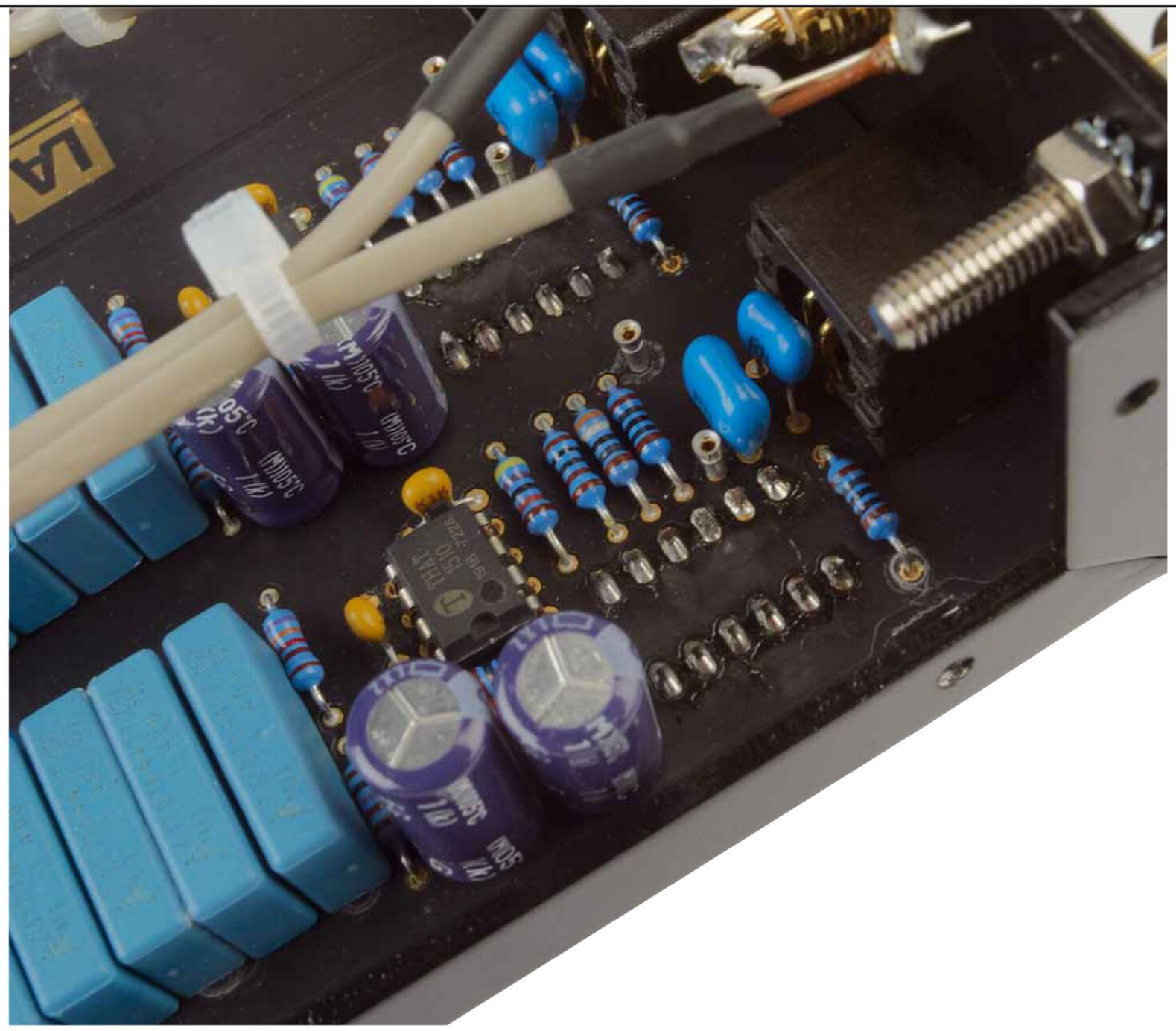
What we played

UFO
UFO1

Ella Fitzgerald
Ella Swings Lightly

Esbjörn Svensson
Solo

Pink Floyd
Wish You Were Here



Thatcorp amplifier. One of the best things you can do to MC signals

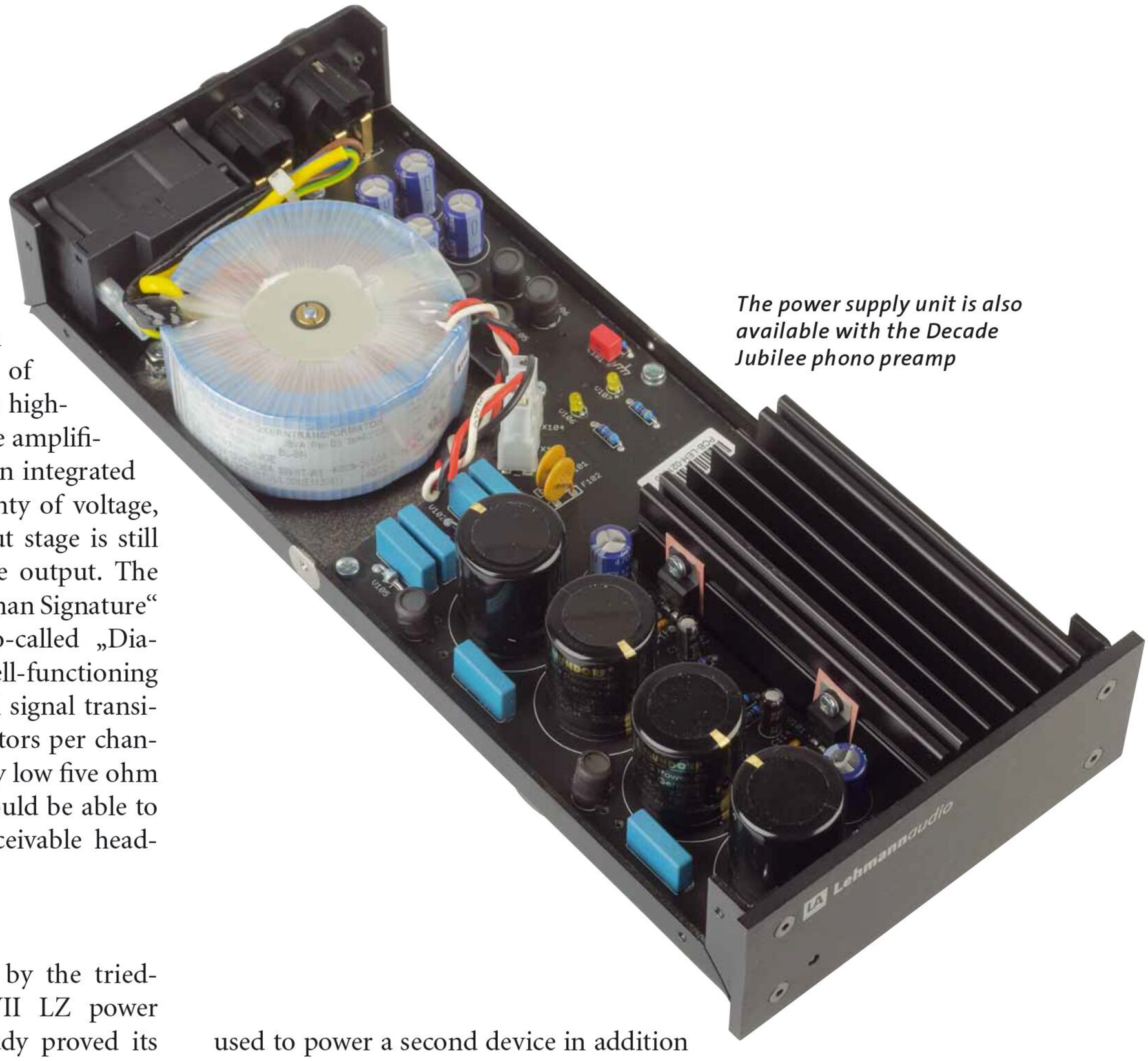
Not much more can be accommodated on the back of the device

allows the configuration of the the obligatory subsonic filter for phono operation, with four cut-off frequencies adjustable between 7 and 78 Hertz. Finally, block „C“ allows the selection of four possible input impedances, one of which is a slot that can be equipped with custom values. In addition, further values can be realized by parallel connection. MM/MC switching is also carried out here. Speaking of MM: 100 picofarads of termination capacitance are standard, a further nanofarad can also be switched.

Inner values

A look under the lid reveals a fine combination of well-known Lehmann design elements. The phono preamp is a two-stage affair with passive equalization. Here, too, Norbert Lehmann did not miss the opportunity to use the famous Thatcorp instrumentation amplifier chips at the input, which are still the measure of all things in terms of low noise. For equalization, he relies on tried-and-tested MKP capacitors from Epcos (formerly Siemens). The second amplifier stage is handled by two

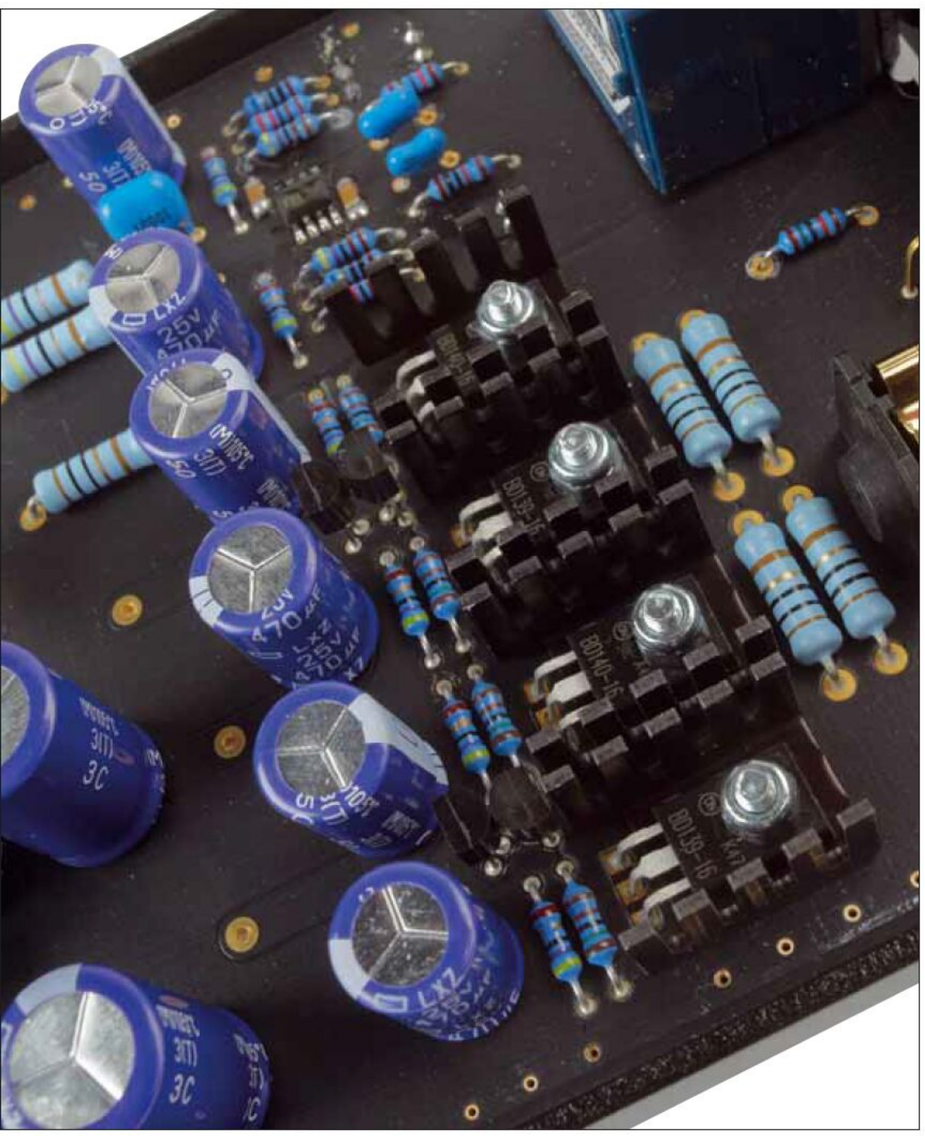
SMD eight-legged components, the type designation of which I was unable to decipher. Two relays then switch between the output of the phono preamp and the high-level input, while the voltage amplification is again handled by an integrated eight-leg. There is then plenty of voltage, but a low-impedance output stage is still required for the headphone output. The job is done by another „Lehman Signature“ arrangement, namely a so-called „Diamond Buffer“. This very well-functioning circuit consists of two small signal transistors and two power transistors per channel and ensures a sufficiently low five ohm output impedance. This should be able to supply just about any conceivable headphones with sufficient level.



The power supply unit is also available with the Decade Jubilee phono preamp

Power supply

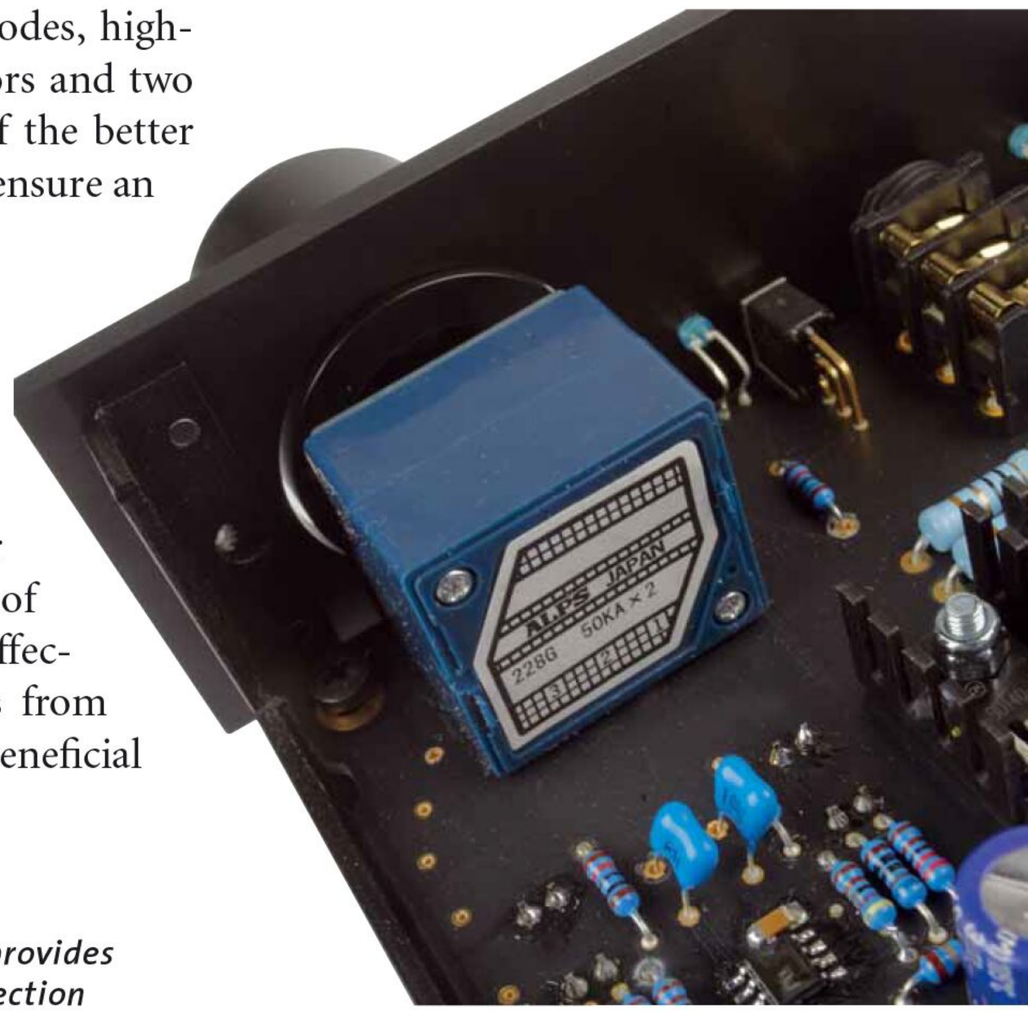
The Phonolith is powered by the tried-and-tested Lehmann PXWII LZ power supply unit. This has already proved its worth in the Decade Jubilee phono preamplifier, for example. It could even be used to power a second device in addition to the Phonolit. A second phono preamp perhaps, which then docks onto the line input of the Phonolith‘s line input? More than enough power for such thought experiments is provided by the built-in 30 VA toroidal transformer, a fine rectifier constructed with individual diodes, high-quality Mundorf filter capacitors and two integrated voltage regulators of the better kind. A few chokes in between ensure an even smoother supply.



The Diamond Buffer output stage provides the power for the headphone connection

Mechanics

We don‘t want to neglect the interesting substructure of the two devices. They each rest on three in-house absorber feet, in which a combination of absorption measures ensures effective decoupling of the devices from the ground, which is certainly beneficial to the sound.



The volume control is provided by one of the famous ALPS potentiometers

Sound

Let‘s start with the full program and use the Lehmann as a phono and headphone amplifier. The Phonolith had no problems at all with my Sendy Audio Peacock magnetostatic headphones, which are not entirely easy to drive, and was a delight with its very transparent and fresh sound. The signals are supplied by a Skyanalog G-1 MC, which fits perfectly into this environment. UFO‘s immortal classic „Boogie“ from the band‘s first album grooved with an almost outrageous dash and even had the right amount of „balls“. The Lehmann sorted out the brutally stereophonic spectacle excellently, locating Phil Mogg‘s dirty organ firmly in the middle, even at the age of 19 - a wild ride, that thing. Ella Fitzgerald, on the other hand, „swung lightly“ and sounded at the exact opposite end of the spectrum. Dynamic, fluid, expressive – no problem at all for the Lehmann.

When operated via the line outputs, it was even harder to assign a real character to the device. The Atma Sphere monos showed exactly the same slightly cuddly timbre that was already evident elsewhere. All in all, a genuine Lehmann with unmistakable studio genes – if you‘re looking for a specific sound, you probably won‘t find it here.

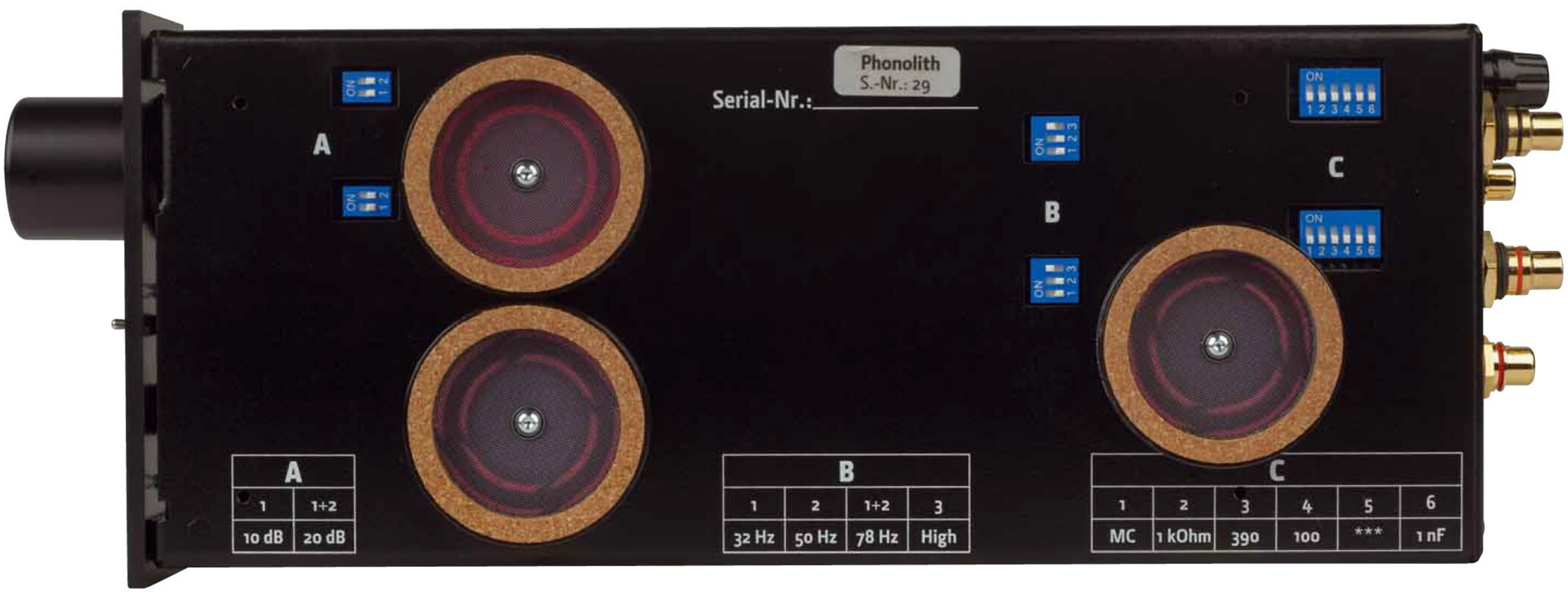
Holger Barske

Measurements

Lab commentary

The measurement diagram shows the different frequency responses at different subsonic settings. It is important to pay close attention to the setting due to the high effectiveness of the filter. A slight channel imbalance is also visible, but this is less than half a decibel and should therefore not be significant. The other measured values "over all" are without fault. In MC mode at an input voltage of half a millivolt and an output voltage of one volt, the device delivers a signal-to-noise ratio of 73 decibels(A) and a channel separation that is at least as high, with distortion amounting to a negligible 0.02 percent. The power consumption in idle mode is 8.2 watts.

There is also plenty going on on the underside of the device



Lehmann Audio Phonolith

· Price per pair	2,800 Euro
· Distribution	Lehmann Audio, Köln
· Phone	+49 221 29493320
· Internet	www.lehmannaudio.de
· Warranty	2 years
· Dimensions (W x H x D)	110 x 50 x 280 mm (per device)
· Weight	approx. 2,8 kg (completely)

lp

Lehmann Audio Phonolith

International 2/24

» Lehmann's complete solution shines with the well-known virtues of the company: transparency, straightforwardness, incorruptibility. The device has no tonal preferences; dynamically it is first class. An excellent problem solver for minimalists!

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Now available

Coming soon:

Variants of a theme

There are two very interesting new cartridges from Chinese manufacturer Skyanalog, an entry-level MC and a brand new top model. We introduce both.

Swiss precision

The Swiss manufacturer EMT is an institution when it comes to analog technology. We present the 928 II turntable with two tonearms for the first time.

Next issue LP International August 30, 2024

Michael E. Brieden Verlag
The Test Specialists

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  Gartroper Straße 42, D-47138 Duisburg
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